Innovation in the Public Sector

Publin Report No. D14

The structure and size of the public sector in an enlarged Europe

By Andrés Maroto and Luis Rubalcaba

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By Andrés Maroto and Luis Rubalcaba,
University of Alcalá, Spain

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Introduction

This report presents the basic figures and economic dimensions of public sector in Europe. It intends to be an introductory contribution to the PUBLIN project. The study of innovation in public sector can be introduced by a preliminary analysis about its structure, role and basic economics. This is particularly important in a Europe where different models, sizes, and organisational ways do exist. The significance and impacts of innovation in public administrations will be affected by differences in their sizes, dimensions, and socio-economic organisations.

The public sector is based on old relationships between political authorities, organised through the State, and the citizens. This is not the right place to analyse the historical, philosophical and sociological justification of the State, limiting and/or guaranteeing, to some extent, and depending on the view, the freedom of people. However, it is necessary to point out that the public sector in Europe comes from a long tradition where the Absolute States in the 17th century and the French Revolution in the 18th Century constitute a key reference. The ideas of Hobbes or Rousseau established a philosophical justification of the State, given the limits of human nature when living in society. A relatively strong State is needed to manage societies and preserve individuals' freedom. Public sectors were organised to perform a certain economic, political and cultural power. Sometimes they represent a power that should be limited to the guarantee of basic individual rights and basic social services (e.g. during the industrial revolution in the 18th century). Some other views will involve something else –the State is considered to be responsible for certain major problems and it is legitimated to interfere actively in the society. Even more, some extreme views, like the ones derived from Hegel, support the concept of State as a good in itself, not only as a power so the State act in full legitimacy to interfere in all dimensions of social and economic life.

The modern public sector is a consequence of a long and even controversial process where different organisational models, sizes and profiles have been evolved. But, in any case, the State is actively present in social and economic life. Economic life constantly depends on the economic decisions of the governments, which can be illustrated in the taxes we pay. Personal income taxes, sales taxes, local taxes and contributions to Social Security mean a substantial proportion of personal income. Corporate income taxes, capital earnings taxes and other ones have an effect on capital owners. Almost everybody, receive at any time transferences from the government, such as the Social Security programmes. An important quote of the workers is paid by the State or produce goods betrayed by the public sector. Many children go to public schools, everybody enjoy public parks, highways and other services or infrastructures. More recently, many people are interested in the public politics from the environmental point of view, as the authority in charge of preserving natural resources and promoting sustainable development.

Contemporary politic theories are focused on showing politics as a mirror of the society, the political phenomenon as disaggregated consequence of individual behaviours, which are caused by subjective facts. However, some recent opinions within Political Science point out a link between this kind of phenomenon and the traditional economic study of institutions. This New Institutionalism focuses on the relative independence of political institutions and the importance of an intense comprehension of its functioning.

Due to all these points, public sector really has a great economic and social importance all over market economies, but even much more within the European Union, where this research is focused on, so these economies are the best models of Welfare State economies. This fact becomes an economic achievement, and shows the EU trying to get the right balance between high social protection levels and income redistribution processes, what sometimes involve a certain trade-off between economic growth and income distribution. More recently, some other debates are in the centre of discussion about the modern role of States; for example, the debate about complementarity/substitutions between public and private (crowding out effects included); the debate about the conflict between Welfare State and competitiveness or the debate on modernisation and innovation of public sector (the key subject for PUBLIN). Because of all these old and new debates, the present discussion about the size and structure of the public sector has a more direct effect on the European Union than on any other regions around the world.

Both the importance of public sector within the modern economies and its structure and size, are very connected with the main core of the project in which this report is included: “Innovation in Public Sector –PUBLIN-”. As stated before, in order to understand the innovative processes underlying in the public services, it is necessary to have a solid basis about what the public sector is and what its relative importance and way of functioning are. So, it is necessary to make a previous analysis on the size and structure of the public sector within the European countries.

The main objective of PUBLIN is to develop a general and consistent basis to understand both the main innovation processes in the public sector and policy-learning development within this sector. In order to achieve this objective, it is necessary to look at the public sector within the social context in which the institutions interact, and the relations between these and the private agents. In addition, it would be necessary to examine the influence of politics, management, evaluation, cultural treatment and entrepreneurship of the public sector on the development of innovative and learning processes. So, due to all this, it is necessary to set up a preliminary analysis about the structure and way of functioning of the European public sector.

Following these ideas, this report is divided into three main chapters. After a brief introduction, some few theoretical hypotheses about the importance and way of functioning of the public sector in Europe will be introduced. In the second part, it will talk about the structure and organisation of public sector; and about its size in a third one, both at a theoretical and statistical level. The research ends with few general conclusions summing up the main core facts discussed before.

First part: Public sector in Europe

Public Sector: basic items

The term ‘public sector’ is often used indiscriminately. Three definitions can be found (Khury and Van der Torre, 2002; Kuhry, 2003):

Legal definition: the public sector includes government organisations and organisations governed by public law

Financial definition: besides the above organisations, the public sector includes private organisations largely funded by public means, including non-profit organisations providing education and health care

Functional definition: in this case the pubic sector includes all organisations in the field of the public administration, social security, law and order, education, health care, and social and cultural services, irrespective of their funding source and the legal form of the supplier. The functionally defined public sector is sometimes termed the ‘quaternary sector’ in policy debates in some European countries, such as Netherlands or Belgium.

In this report, the functional definition is applied. Instead of the awkward term ‘quaternary sector’ the term ‘public service sector’ will be used in this context.

The government perform a number of tasks which cannot simply be left to the market. They include the provision of ‘public goods’ and ‘private goods’ with major externalities (Musgrave and Musgrave, 1984). The consumption of public goods is non-rival and non-exclusive. Examples include dikes and national defence. Major externalities are associated with the consumption of private goods such as education (well-informed public, productivity of the labour force), health care (to counter epidemics) and cigarettes (premature death). Although is easier to recognize the public sector than it is to define it because its profile varies among countries and it is continuously changing, there are at least three important features of the public sector in democratic and advanced societies (Connolly and Munro, 1999), such as in the European countries:

Compulsion: The Public Sector is the most powerful single institution in a society and has a monopoly over certain types of activity, law-making among them, maintaining an army and waging war with other countries.

Accountability: Although it can be claimed that the public sector has a monopoly on power, in practice it is hemmed in by constraints, from the actions of the other states to the actions of its earlier self, in the form of the constitution (written or unwritten) and its laws, which do not constrain the government from writing new legislation, but do limit the other components of the state, the judiciary, the Civil Service and other public sector organisations, such as schools. The constraint that makes democratic states different is that the members of their governments face the test of elections from time to time –they are accountable to all the voters of their countries.

Motivation: A third and much disputed feature of the state concerns the motives of people working for the public sector and the expectation that other people have about such motives. State employees and, more generally, anyone within the public area, are expected to serve the "public interest" and, to a greater extent, compared to employees of profit-maximising organisations, tend to be motivated by desire to serve their country and its citizens.

Of course, these features are present to some degree in many other kinds of organisation. Other institutions, such as firms and charities, also face democratic constraints on their activities, via shareholder or membership meetings, but the constraint of having to seek election is probably far more significant to a government than it is to the board of a company faced with the more immediate constraint of competition. Non-selfish motives can also be found throughout the economy (just as selfish motives are common within people who work for the state) and are of prime importance in families and many charities. The lesson is that it is probably dangerous to look for a unique property, which is possessed by all democratic states, but not by other institutions. In practice, it seems to be a cluster of attributes and their strength that makes the public sector unique.

A further dimension to the question of what the public sector is is provided by the observation that, like most large organisations, the public sector is not a monolith; it operates at many levels. National or federal governments may control defence and foreign policy, while local or provincial governments deal with matters such as health and education, and waste collection and street lighting are dealt with at an even lower level. This separation of activities partly represents a managerial decision. In most European countries there also constitutional limits which separate out the powers of local and federal governments; and, an increasing proportion of power now lies beyond national governments in the organs of the European Union.

The role of Public Sector in the current economies:

The economic analysis usually lays on supposing that the markets adjust automatically, as if they operated in a universe without frictions, but this only is an abusive use of the classic metaphor of the "invisible hand". Adam Smith in 1776 already explained clearly the weight of the institutional factors as conditioners of the performance of the individuals and, two centuries later, Ronald Coase defined as transaction costs the price that the economic agents have to pay to make the markets work. The creation of collective organisations like the State, that defines and guarantees an institutional frame in which the individuals and the companies act, lowers the price of the transaction costs that these have to support, making possible the extension and functioning of markets. Consequently, the first task of the State in the economy is the configuration and maintenance of an institutional frame. This task is not superfluous or circumstantial, but it is the foundation of economic organisations.

Nevertheless, the State is nowadays not limited to act like a legislator and referee for the deprived sector, but that in multiple aspects is an active participant in markets. Sometimes it conditions, with very concrete and not only generic regulations, prices, amounts and types of products to be interchanged; for example, through the fixation of the minimum wage, the electrical tariffs or the food quality regulations. In other cases, it acts more like an economic agent, going to the financial markets or undertaking enterprise activities in concurrence with the private sector; thus it happens when finances the deficit emitting public debt or manages state companies in sectors so varied as transport, health, mining or the financial system. It also modifies the distribution of the rent, by means of progressive direct taxes and systems of transference of rents, such as pensions; or it influences in the conditions of financing of the economy through the monetary policy. With such performances, the public sector is implied in the economic activity until the results obtained in the markets are corrected in order to improve them, taking care of objectives that, it assumes, are generalised social demands and they are not guaranteed without that intervention.

The first of such objectives is to palliate market failures, such as the monopoly, externalities or public goods, in which the market by itself cannot obtain an efficient allocation of resources. The second objective is to modify the distribution of the rent in an equitable sense by means of a policy of public cost which it makes abundant transferences in cash (unemployment subsidy) or in species (education), financed with progressive tax systems. Third of the admitted general missions it is to reduce the cyclical disturbances of the economy and to obtain therefore a balanced footpath of growth, in which high levels of employment become compatible of stability of prices.

In summary, the public sector in the economies of the advanced countries, and among them the European ones, fulfils one two-fold mission: he is creative and responsible of the institutional frame in which they operate the subjects and also an authority that take part actively in the economic processes correcting the results that would obtain the markets. Sometimes it has been denominated “arrangement policy” to the first one, and “process policy” to the second one. In order to take care of both tasks, the public sector has two generic instruments, by which it spills the principle of authority or capacity of coercion, the regulations and the public property, and a third instrument that does not need such principle, because the public sector, in theory, acts like a private agent itself, the state company. In this analysis, the second instrument will be explored, leaving the other two for later studies, since it is the instrument that specifies the size and structures of the public sector in the European countries.

Welfare State and typology of States:

Theory and typology of States:

One of the main roles that the public sector takes at the present time is to develop all the activities that the Welfare State implies, which means the displacement of certain areas of the social conflict to the sphere of public action. It is a public institutional space where, by means of a couple of social policies, interests are dissolved and collective necessities are solved. In strict sense, the field of the social policies extends, on the one hand, to the public interventions on the labour market and, on the other hand, to the redistribution conflict. In summary, the welfare policies are satisfied like collective management actions of the multiple axes of inequality, such as class ones, sort ones, of citizenship ones... - that furrow the multiple spheres that display the advanced societies at the beginning of the 21st century.

In a strand of the literature, the performance of welfare states is linked to their institutions. A typology aims to explain the performance of national institutions for in the light of their key characteristics. One well-known typology of institutions for social protection found in welfare states was developed by Esping-Andersen (1990). Before that, between 1960-75 the three great models of European Keynesian Welfare State are based, which can be observed in table 1.1. Titmuss in 1974 had laid the way towards the consideration of three models differentiated of social protection in advanced Capitalism.

Finally, in 1990, Esping-Andersen retakes this proposal and builds a very influential three-poled typology. In his approach, the defining characteristic of welfare states is the generosity and accessibility of government programs designed to protect the citizenry against loss of income and poverty. He proceeds by grouping countries on the basis of a historical sociological theory, and uses and analytical sociological model to define three types of welfare state that perform differently in their efforts to provide social protection. Each type is different in terms of the regulation of labour markets (primary protection) and the level and scope of income guarantees (secondary protection). He distinguishes, in particular, a Nordic or socialist model (with Sweden like paradigm), a Continental or Christian Democrat model (Germany) and an Anglo-Saxon or liberal model (United Kingdom). Eastern countries emerge as a separate type of welfare state (SCP/CERP, 2004). This typology projects on three main dimensions of variation:

- *Three referring normative global ones* that works as symbolic law foundation. For the liberal model, the WS represents the collective space of “attendance”, as opposed to the precise bankruptcy of the axis family-market; for the Social Democrat model, the collective space of redistribution, before the unequal allocation of mercantile rents; for the Christian Democrat one, the collective space of security, opposing the risks of the disease, disability or elderly.

- *Three ways to structure the social protection*. The Nordic model articulates its supply of services and transferences on the foundation of the social rights of citizens, designs universal policies and supports them in a regime of direct and progressive taxation. The continental model articulates its social diary around the direct entailment of people to the labour market. The policies can offer intensive levels of protection per capita but its logic cover is selective, connected to the mechanism of labour quotes; the fiscal model leans then in good part on the regime of quotations. The liberal model articulates its supply of policies on the criterion of social need, offering services and selective transferences related to verifications of resources, that is to say, to the exigency to locate itself below a threshold of personal or familiar income and combining a regime of weak taxation with the financing of the public well-being together with the users of these services.

- *Three schemes of labour relations*. The Nordic model is characterised by a high rate of cover of collective agreements, articulated to a very centralised and co-ordinated structure of social agreement, and to high indexes of union affiliation. All this is opposed to a model of little public regulative intensity of the labour market. The Continental regime displays the higher mean level of collective contractual cover, nevertheless it occurs in a more complex territorial and sectorial frame of negotiations and, mainly, in a context of smaller union-trade system. The State incidence on the labour market is very high. Unlike the previous model, this moves more towards public intervention. The Anglo-Saxon regime displays a different internal logic. The rates of union affiliation are located only behind the Nordics, but they mark the space of cover of collective negotiation very directly, which takes place in a much more complex scene, with predominance of the agreements of company over those sectorial or territorial. Furthermore, the regulative regime of the labour market is weak.

In a systematic form, the literature on welfare states has been excluding the southern countries of Europe (Spain, Greece, Portugal, and partly Italy). Nevertheless, they nowadays receive equal importance that the rest of European countries, so some authors like Castles (1995) describe an alternative model for these countries defined by the low levels of social expenditure within the framework of political structures of well-being of clearly Continental type. It would be ahead of a Christian Democrat regime of social protection and labour, of still recent development. Other authors such as Rhodes (1997) maintain own aspects of the South. In agreement with this last approach, they can be summarised the characteristics of the Mediterranean-Latin Welfare State:

- Centralised contributing social distribution and security system, very fragmented.

- Assumption of universal models of health and education financed by taxes, with levels of expenditure per capita below the EU average and in coexistence with wider private sectors than in the rest of the EU.

- Household attendance scheme

- Labour Relations with high rates of cover of collective negotiation but with very low union densities.
- Excellent impact of the social and cohesion policies of the EU, quantitatively as well as qualitatively.

Mediterranean countries are characterised by limited access to social security, but a high level of pension benefits. Corporatist countries score fairly low on both points, liberal countries score low on providing pensions and social-democratic countries score high on access to social security programs. In fact, Eastern European countries resemble corporatist countries to a great extent. While responsibility for social protection rests largely with the individual in liberal countries and with the public sector in social-democratic countries, in corporatist countries (Nordic and Eastern ones) it is more the province of civil society, with an important role for employer, professional and trade associations. If European countries are analysed at this moment, it will be observed that four-fold (or five-fold) welfare state typology, with all their characteristics.

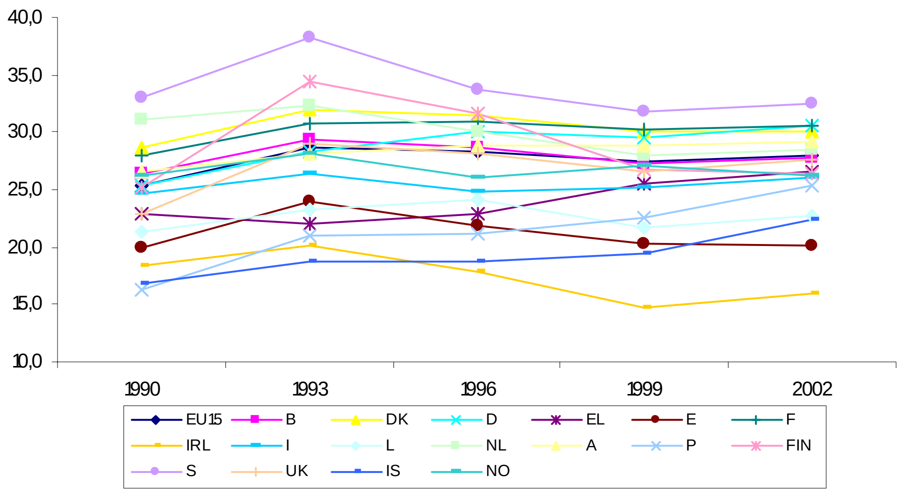
Other studies have attempted to find a relationship between key demographic indicators and the institutions of welfare states. For example, Mellens (1999) has tried to relate birth rate, migration, family formation and the death rate to dominant socio-economic and cultural treats of welfare states. Socio-economic characteristics here include level of income, educational attainment and health status of the population. Cultural characteristics include gender equality, conservatism, individualism and post-modernism. In fact, his classification is largely consistent with the classification based on the degree of social protection. Mediterranean, Scandinavian, Central European and Eastern European types can be distinguished, although he finds no liberal cluster in his analysis.

Features on social protection in Europe:

The modern-day welfare state remains on action plans like the ones included in the Beveridge Report (Beveridge, 1942), which established a social insurance system protecting households from the insurable risks of poverty. The scheme was intended to provide support to those groups most in need of social welfare, namely, the elderly, sick, unemployed and families on low incomes.

Expenditure on social protection has risen since the inception of the Welfare State until this moment; and as can be seen in figure 1.1, expenditure on social protection has accounted for a growing proportion of central government expenditure and gross domestic product during the first years of the 90s, until 1993 (from an average of 25.5% of GDP to just over 28.5%). In the last 90’s years this trend went down, coinciding with the end of the recession of the early 1990s, which pushed up expenditure on unemployment benefits in particular, but also on disability and housing benefits. Only in Portugal, Greece, Germany, Austria, Belgium and Luxembourg, spending continued to rise relatively to GDP over the three years going from 1993 to 1996. In the first two, it reflected the ongoing development of the social following-protection system, and in the last year, the failure of their economies fully recovered as in most of the Union. Therefore, it can be observed how the evolution shows in 1999 similar social protection levels than in 1990 in almost all the countries analysed. During the first years of the 21st century the social protection expenditures has softly risen or stayed around the same numbers than in the last 90s years.

Figure 1.1 Social protection expenditure for selected European countries (as % of GDP)

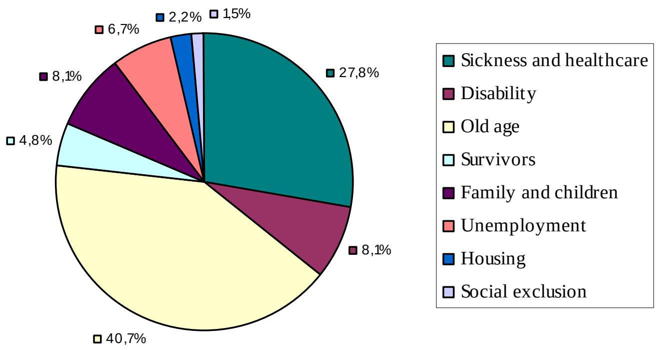


Source: Eurostat (2004).

By the year 2002, the total welfare expenditure of the European Union had reached 6748 euros per habitant. In relation to output, overall spending on social protection in the Union, gross of any taxes or charges levied on benefits, amounted to 28% of GDP. The level of spending ranged from more than 30% of GDP in France, Germany, Denmark and Sweden, (with Sweden having the highest level at around 32.5% of GDP), to less than 25% of GDP in Iceland, Spain and Luxembourg, and only 16% of GDP in Ireland. In very broad terms, the countries with the highest level of GDP per head tend to spend proportionately more on social expenditure, but the relationship is by no means systematic, with expenditure in Sweden and Finland, in particular, being higher than it would be expected on this basis, and expenditure in Italy and Ireland being lower.

It is also observed a common pattern of social expenditure among the European countries. Spending on old-age accounts for by far the largest element of social protection in the European Union, amounting to an average of 40.7% of the total spending in 2002, with sickness and healthcare the second largest, accounting for just over 27.8% of the total. Outlays on disability and family and children benefits were of a similar size, each accounting for just over 8.1% of total outlays. Expenditure on unemployment is only slightly smaller, on average, than outlays on disability and family and children, while spending on the other three kinds of benefits –survivors, housing and social exclusion- taken together is much the same size as this, averaging around 8.5% of overall spending. The main areas of expenditure are shown in figure 1.2.

Figure 1.2 Government welfare spending 2002 in the EU (as % over total social expenditure in the EU)



It is important to point out the changing context of social protection systems which has had profound implications and will continue to do so in future years for social protection systems analysed before. The following four major trends are of particular importance: the age of the population in all Member States and the prospective increase in the rate of growth in the number of elderly people from 2010 onwards; the growing participation of women in the labour force and the changing gender balance; the persistence of long-term unemployment, especially among older workers, and the trend towards earlier retirement; and the increase in the number of households in relation to the population growth, with the rise of people living on their own and households with no working member.

Moreover, these trends are occurring in a context of increasing globalisation and a faster pace of technical advance, which have accelerated the speed of structural change in the economy, put greater pressure on business and workers alike to adapt to changing market circumstances and new working methods, and reduced the ability of governments to manage economic developments. At the same time, they have increased the importance of securing financial stability and have limited the scale of government borrowing, as well as constrained the growth of public expenditure. Public policies are directly affected by fiscal consolidation required by the Stability and Growth Pact, as well as by the broad economic policy guidelines, which provide a framework for reforming public policies in line with broader objectives, supporting employment and job creation in particular.

Second part: Structure of the public sector in Europe

After the rapid expansion of the welfare state in the 1950s and 1960s, the public sector has been under considerable pressure in the past few decades. Declining public confidence in government institutions and growing demands on public finances have prompted governments to initiate measures to trim the public sector and make it more efficient and effective.

Thus, after the great crisis in the 1980s, a “new” state is being built during the 1990s in the European Union. This “new” state will be the outcome of deep reforms –reforms that will enable the state to perform the roles that market is not able to perform. The objective is to build a state that responds to the needs of its citizens, a democratic state where bureaucrats respond to politicians and politicians to voters in an accountable way. For that reason, there are essential moves: political reform to increase the legitimacy of governments; fiscal adjustment, privatisation, deregulation to reduce the size of the state and improve its financial health; and administrative reform that, in addition to improving the financial situation of the state, will provide the means of good governance. Reform of the state apparatus, a reform the will allow for a managerial public administration in the public sector, is discussed (Bresser Pereira, 1997).

Reform strategies adopted can be catalogued as: maintain, modernise, marketise and minimise (Pollit and Bouckaert 2004):

‘*Maintain’* involves tightening up traditional control mechanisms. The existing system is stretched, for example, by placing linear restrictions on expenditure (the ‘cheese slice method’), with no downward revision of policy targets. Another example of the Maintain strategy is more detailed control of expenditure programs. Although this strategy causes less disruption in the functioning of government organisations, it is probably not adequate to tackle existing financial and legitimacy problems of the public sector.

‘*Modernise’* involves organising alternative structures and processes of government policy making. However, any modernisation operation must be consistent with traditional values of public service provision. The public sector is intrinsically different from the private sector, and any fundamental reform has to take account of these differences. The focus of reforms is to improve management (managerial modernisation) and/or to foster participation by citizens and user groups (participatory modernisation).

‘*Marketise’*, the third strategy, involves introducing a private-sector focus to the public sector and its values. It does not mean that services are privatised. The aim is still primarily to reform the public sector, not to reduce its scope and public outlays. Techniques common to the private sector are transplanted wholesale to the public sector. In doing so, the unique character of public sector services is implicitly called into question. One example of this strategy has been the introduction of internal competition (competitive tendering) in the United Kingdom.

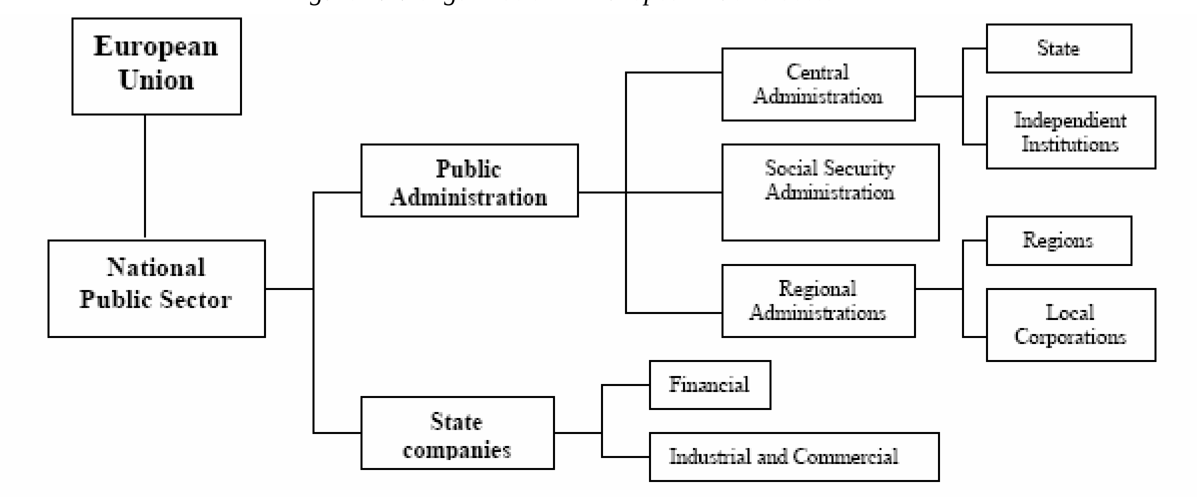
'Minimise' – reducing the public sector – involves privatising functions that have traditionally been in the domain of the public sector. The railways in the United Kingdom are quoted as the poorest example of privatisation, but privatisation has been much more successful in other sectors (such as telecommunications) and in most cases the new enterprises and the new markets become much more efficient and performing.

Public Sector Organization in Europe

Generally, the public sector in Europe takes part in the economy using three basic instruments: regulations, public property and state companies. While the last ones are organizing instruments of private initiative, adopted sometimes by governments, regulations and public property are eminently public action instruments, which are put into practice by means of exclusive organisations: Public Administrations. Therefore, from a structural point of view, the European public sector is composed at a national level by the Public Administrations and the state companies (see figure 2.1).

Although there are some differences between countries, in general, Public Administrations act basing on the criterion of authority and not on the market, and the main part of its financing, reflected in budgets, is obtained coercively through the tax system. Within them, it is necessary to distinguish among Central Administration, Social Security Administration and Regional Administrations. The Central Administration is composed by the State and the Independent Institutions and controls most of the public revenues, although the decentralisation process in favour of the Regional Administrations and the growth of pensions has made it to lose importance throughout the recent years. The centralisation of income, on the other hand, causes that the State is the origin of multiple transferences towards the remaining Administrations, with which these finance their activity to a large extent.

Figure 2.1: Organization in European Public Sector



Source: Based on Serrano, J.M. (1997).

The functions of Social Security Administration are not territorial, but rather specialises in the management of the original core of the Welfare State, i.e. the social protection costs, mainly including pensions and health services. Its financial system varies according to the countries, although, in general, it is usually mixed: it receives direct contributions from the social quotations paid by the workers and managers, and receives transferences from the State in an increasing proportion of its total income.

One of the great recent organisational changes in the European public sector is the intense and fast decentralisation process of Regional Administrations. It is important to point out that this process has not become at the cost of Local Corporations, whose importance has stabilised, but by reduction of the weight of the State.

The other main part of the public sector in Europe, along with the Administrations, is state companies, usually divided into commercial and industrial, on the one hand, and financial, on the other one. State companies were created in order to reach, by their participation in the markets, certain considered strategic objectives for the State, such as the presence or the control of key productive sectors (such as energy, transport, communications or defence), or the promotion of the national or slow zones development. In the last decades, it has been registered a privatisation process of the state companies throughout the European Union, where the number of the state companies has been remarkably reduced.

Finally, due to the process of integration carried out in Europe in the 50s and 60s it is also necessary to speak of the institutions of the European Union within the structure of public sector in Europe, as much in the scope of the regulations as in the public property. On one hand, many laws and rules addressed to national economic agents are announced by the European Union institutions; on the other hand, although the EU financial activity is residual in some countries, e.g. Mediterranean countries, this is constantly increasing in the recent years.

Reforming state structure in Europe: Re-organisation and decentralisation

Nowadays, although structural adjustment remains a major objective in European countries, the emphasis has changed to the reform of the state, and particularly to the administrative reform. Now, the central issue is how to rebuild the state and how to redefine a new state in a global world. This change of focus is also taking place in the European Union, where the administrative reform has been added to the tax reform, as well as the social security reform and the elimination of state monopolies. Comprehensive reforms of public administration in many countries during the 1970s and 1980s have given way to more targeted reforms. Recent reforms in the public sector have often been carried out as a response to pressures to limit public spending, to strengthen economic performance or to keep up with the innovations introduced in the private sector, such as the introduction of information technologies. Country-specific forces are usually at the root of public sector reforms (Knox, 2002).

Table 2.1: Recent reforms in the Public Sector

Type of reform	***Human resources management***	***Introduction of ICT***	***Privatisation and outsourcing***
Mechanisms	Improvements in the incentive structure (wage differentiation, hiring and firing practices, promotion)	Introduction of ICT, changes in working methods and e-Government practices	Arms-length agencies, privatisation of service providers, and public-private partnerships
Critical factors	Reliable output and performance indicators	Quality of information, time savings, speed of response in interaction with citizens and businesses, and common standards across public agencies	increasingly efficiency, productivity, profitability and capital investment spending, risk sharing, management skills, and employment reductions
Examples	New Public Management and Total Quality Management	e-Europe 2005 Action Plan and US Government 2002 Programme	See Bennet et al. (2004), Claessens and Djankov (2002), Frydman et al. (1999), Gonenc et al. (2000), Nicoletti and Scarpetta (2003), Van der Nord (2002), and La Porta and Lopez-de-Silanes (1999).

Source: European Commission (2005)

Table 2.1. summarises the three types of reforms to enhance efficiency in the public sector: management reforms, introduction of information technology; and privatisation and outsourcing processes.

It will now summarise some reasons for the increasing interest in state reform in the 1990s. An important one is probably that people realised that structural adjustment was not enough, if it is not linked to an administrative one. Since the mid-1980s, the countries engaged in fiscal adjustment, trade liberalisation, privatisation, and deregulation. Outcomes were positive. On the other hand, it became increasingly clear that the basic cause of the great crisis in the 1980s was a state crisis: a fiscal crisis of the state, a crisis in the model of state intervention, and a crisis of bureaucratic form by which the state is managed. The solution is not to weaken with the state, but to rebuild it, to reform it. The reform will probably mean shrinking the state to limit its role as a producer of goods and services, and to a lesser extent, as a regulator; but it will possibly entail the social services, where externalities or basic human rights are involved, and it would also increase its role in promoting international competitiveness for local industries.

In the recent years, people are becoming increasingly aware that bureaucratic public administration is inconsistent with the demands that civil society has in contemporary capitalism in relation to governments. People demand much more from the state than it can deliver. And the immediate reason for that gap is not only fiscal, as O'Connor (1992) pointed out, nor just political, as Huntington (1968) stressed. It is also administrative. Economic and political resources are by definition scarce, but this limitation may be partially overcome by efficient use by the state.

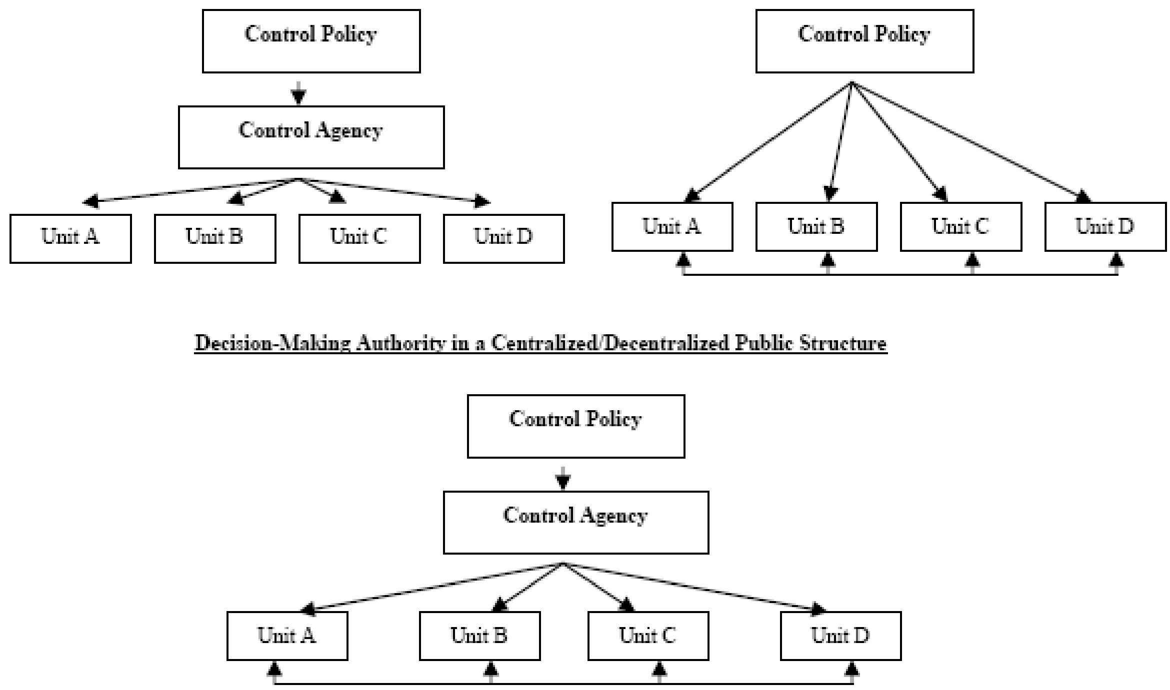
The role of a proficient public administration becomes strategic in reducing the gap between social demands and their fulfilment.

There is however, a broader reason for the interest in reforming the state and particularly public administration: the increasing relevance of protecting the public patrimony (*res publica*) against rent-seeking activities. The state is meant to be public, public non-profit organizations (or non-governmental organisations) are meant to be public. Strictly public goods, as a protected environment, are meant to be public. Public rights are the rights people have, those that the public patrimony, the *res publica*, understood in a broad sense to be public –of and for everybody- instead of the object of rent seeking, instead of being fully "privatised" to private enterprises. Public sectors can be provided by public funding under private management or the civil sector. Reform of public sector means less direct provision by the State and more public services provided by the society.

This new *Managerial Public Administration* has some basic characteristics: i) It is outcome- and citizen-oriented, ii) It assumes that politicians and civil servants are entitled to a limited degree of trust, iii) It uses decentralisation and the incentive to creativity and innovation as strategy, and iv) It controls public managers by means of management contracts. This characteristic structure of public sector emerged with strength in Britain in the 1980s, but yet similar reforms have taken place in some other European countries, such as Sweden, Norway or France, and in other countries, such as United States, Australia or New Zealand. This kind of state structure is usually identified with neoliberal views because managerial techniques were often introduced simultaneously with structural adjustment programs aiming to cope with the fiscal crisis of the state. Neoliberalism arose as a reaction against the budgetary crisis and so became identified with spending cuts, downsizing the state. Despite of this, different ideologies move forward this same way, although with different methods and intensities. This fact, plus the obvious superiority of managerial over bureaucratic administration, led governments of all ideological tendencies to get involved in administrative reforms, that usually have a two-fold orientation: expenditure reduction in the short run, increased efficiency through managerial orientation, innovation to a certain extent, in the medium run.

Figure 2.2

Decision-Making Authority in a Centralised Public Structure **Decision-Making Authority in a Decentralised Public Structure**



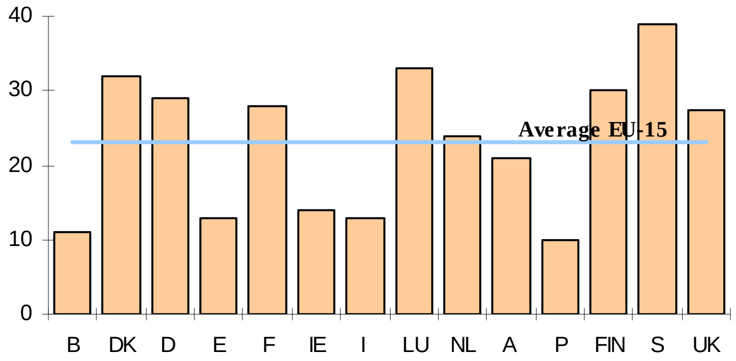
Source: McCue and Pitzer (2000).

Managerial public administration, as it has been seen, involves a change of management strategy, but this strategy must be put to work in a reformed administrative structure. The general idea is the decentralisation of delegation authority (as it can be seen in figure 2.2). Many authors contend that authority or control, especially in government, must be decentralised in order to provide more responsive support to end users, eliminate bureaucratic obstacles to program accomplishment, improve inter-departmental, co-ordination and empower service delivery managers to procure what they need without impediment by a centralised organisation (Osborne and Gaebler, 1992). It is interesting to point out that this decentralisation process in the internal structure of European countries is developing inside a collusion phenomenon between the different countries making up the European Union.

Public control officials have been pulled in a number of different directions attempting to articulate the ideal level where policy making, authority and process should be positioned in the hierarchy. As figure suggests, three primary organisational models have emerged (McCue and Pitzer, 2000). Traditionally prescribed is a fully centralised control system where the lines of authority and functional responsibility are clearly articulated. A mid-range model is a centralised/decentralised form where authority emanates from a given unit that is charged with policy making and oversight responsibility for the control process, as well as facilitating the line departments’ use of the control authority granted to those units. The last organisational form, a purely decentralised structure, has no central authority or control agency other than the enabling legislation or control policies enacted by the legislative body, and service and sub-service delivery managers are both responsible for and accountable for the success or failure of their politics.

Decentralization in this way has many faces. One is functional decentralization, whereby resources and powers are developed to semi-autonomous institutions. Then there is territorial decentralization, which increases the role of other tiers of government, such as regions and local authorities. Decentralization is usually approached from a financial perspective, with a focus on devolving public resources. Figure 2.3 shows the proportion of the government budget spent by local authorities. Three groups of countries may be distinguished. Firstly, the Scandinavian countries, with a very strong local sector (accounting one third of total spending). The second group comprises a number of Central European (accounting for 20%-30%). One notably country included in this cluster is France, which generally has a centralist image. Finally, we have a number of countries with a small local sector, mainly Southern European countries, and also Ireland and Belgium.

Figure 2.3: Spending by local authorities, 2000 (% of total government expenditure)



These figures give a first impression because they must always be viewed in the light of autonomy which local authorities have. Indicators of autonomy include spending freedom and freedom to collect resources. The latter concerns the freedom to increase or cut back certain flows of income, and the former an authority's freedom to spend its income as it sees fit. If these indicators are analysed, the groups identified above remain largely intact (SCP, 2004). Another indicator of the degree of decentralization is the distribution of public servants among the different tiers of government. Data show a shift in staff employed by central government to staff on the payroll of local and regional authorities. The proportion of public servants working in central government is declining, while the proportion of staff working at the local and regional level is on the increase (Pollitt and Brouckaert, 2004).

Administrative cultures and systems.

Differences in administrative culture have a major impact both on fundamental choices concerning the structure of the public sector, and on the daily functioning of the government apparatus. Administrative culture forms part of a wider political and social culture. Hofstede's dimensions are probably the best-known categorisation of administrative cultures (Hofstede, 1980), although other attempts have been made (Mamadouh, 1999). It is clearly no simple matter to group countries on the basis of their administrative culture. Loughlin (1994) groups countries on the basis of broad philosophical and cultural traditions. He distinguishes an Anglo-Saxon (minimal state), a Germanic-organicist and a French Napoleonic state tradition. The Scandinavian type is a mix of the first two. Finally, Hooghe (2002) used four dimensions developed by Page (1995) –cohesion, autonomy from political control, caste-like character and non-permeability of external interest- to construct and index of 'Weberian bureaucratic tradition' (strong, medium, weak), indicating to what degree a national administrative culture corresponds to the Weberian model (strong cohesion, large degree of autonomy from political control, strong caste-like character of the bureaucracy and low permeability of external interests). Her research focused on the European Commission, where differences in administrative cultures are of course more pronounced.

The categorisations discussed traditionally have their own focus, so it is difficult to obtain a clear picture. The categorisation of some countries seems fairly coherent, but the absence of clear indicators means it still entails some risk. The Anglo-Saxon tradition differs considerably from the continental tradition. This is reflected, among other things, in the fact that many public servants in the UK are generalists, while in Germany they tend to have a legal background. The large number of studies of cultural differences among European public servants shows how important it is to take a more in-depth look at this subject. Obviously, the evolution towards a European Administrative Space will be affected by different views on the role of the public administration in society.

Administrative processes.

This section reviews administrative processes associated with the machinery that allows government to pursue its policies. Policy implementation is supported by administrative processes such as financial management, human resources management and information technology (fundamentally, e-Government). The scope of this section extends to the public sector in general, but the government –and the public administration in particular- is responsible for the quality of financial management, human resources and openness in the public sector.

Managing the public sector finances, various factors have prompted public authorities to modernise their budget cycle. The financial reform agenda consists on three major components: greater financial responsibility, results-based budget and multi-year budget.

The New Public Management movement has shifted the focus from traditional a priori control to control in retrospect, and placed more emphasis on results and greater financial responsibility for management. Two indicators of the degree of parliamentary control over the budget and of management freedom are the degree of detail to which the budget is appropriated and the end of year flexibility. The more aggregated the appropriation, the more freedom management has to change the budget allocation. And the end of year flexibility allows managers to carry any surplus budget allocation over to next year's budget. Thus, the countries with the highest degree of management freedom in Europe are Denmark, United Kingdom, and the Netherlands, while Belgium or Spain are examples of those with the least discretionary powers (European Commission, 2005).

The growing important of efficiency and effectiveness has prompted governments to focus more and more on results as the basis for their budgets. Information on output and outcome is included in those and a number of countries are in fact moving towards accrual budgeting, a system of costs and benefits, instead of traditional cash-based budget systems. Finland or Sweden are countries which have full or partial accrual budgeting in Europe, while Ireland, Portugal, Austria or Greece maintain the traditional line-item cash budget geared mainly to inputs, with little performance information. The Netherlands, Denmark or Spain include performance information in the budget documents, but have opted not to make the move to accrual budgeting (European Commission, 2005).

The third trend in the modernisation of government finances has been a move towards multi-year budgets. Most countries add multi-year forecasts to their budgets to place their annual income and expenditure in a longer-term perspective. In most cases, these forecasts are purely informative and do not require parliamentary approval. However, in some countries, such as Italy, parliament does have to do it.

Personnel policy, or *human resources management* is another horizontal policy area within the public sector currently experiencing change. Strategic human resources policy, competency management, equal opportunities policy and public service motivation are key concepts in the modernisation of human resources management. One important choice in public sector human resources management policy is whether to attempt to ensure that the staff profile reflects the composition of the population. Moreover, the Lisbon agenda aims to raise the employment rate of women during the next years. The problem of demographic ageing also presents the public sector with a major challenge. The preponderance of staff aged over 50 in the public service has increased steadily since 1990. As the baby boom generation retires over the next ten years, the public service may face a growing staff shortage. Personnel planning and the recruitment of young staff by prompting the public sector as a good employer are therefore key objectives of current human resources policy.

Finally, the development of a knowledge-based society also has implications for the services and communications of the public sector. There is a general tendency in the public sector towards automating bureaucratic procedures and processes, and electronic interaction with citizens. However, e-government is a very broad concept, ranging from electronic communications, via online services to e-democracy and e-participation. e-Government is one of the newest forms of modernisation in the public sector. In this field, benchmarks are frequently used to compare and rank countries (Jansen et al., 2004). Among European countries, Scandinavian ones (Sweden, Finland and Denmark) and United Kingdom are the countries with the best average score on almost all these studies. On the other side, countries such as Ireland and Southern European countries (Italy, Spain, Portugal and Greece) score below average in terms of e-government. The newly acceded EU member states score less well than the EU-15, although Estonia, the Czech Republic and Slovenia have progressed furthest in the field of e-government during the last years.

Third part: Size of the public sector in Europe

Government growth theories

In the post-war period, the European public sectors have exhibited a remarkable growth, slowing down only recently, especially as a consequence of the European Monetary Union (EMU) requirements. In the spirit of Wagner's Law (Wagner, 1958), public expenditure is expected to be the outcome of income growth. Furthermore, with the public sector growing more than proportionally relative to the private sector, the long-run income elasticity of government expenditure is expected to exceed unity. On the other hand, within the Keynesian context, public expenditure is the exogenous policy instrument leading to economic growth. To test the Wagnerian versus the Keynesian hypothesis, the vast majority of empirical studies focus on a two-variable model involving (aggregate or disaggregated) government expenditure and domestic income. However, it can be observed that general government expenditure and its growth can be patterned not only in terms of demand-side but also in terms of supply-side and institutional factors.

Distinguishing between demand-side and supply-side theories of government size allows for the distinction between responsive government, whose public expenditure is justified by the electors' preferences, and excessive government, which spends beyond the limits imposed by the demand-side following bureaucrats' or politicians' interests (Buchanan, 1977)

Demand-side theories of government growth:

One of the most popular models of government growth is represented by Wagner' Law, which focuses on the demand for goods and services provided by the public sector. It looks at the growth of government both in terms of economic growth and the increasing complexity of the economy that increase frictions and externalities, requiring further government activities and regulatory intervention. Economic growth has the additional effect of enhancing the demand for welfare services, whose components typically exhibit a superior income-elasticity. Wagner also attributes public sector growth to the central and especially to the local government, a distinction that has rarely been recognised in modern versions of Wagner's Law (Gemmell, 1993). These theories are empirically verified when the long-run income elasticity of government expenditure is higher than unity.

Other demand-side theories expand Wagner's Law by adding further explanatory variables to government growth, aimed at capturing the complexity of the economy. The most popular variables used in this case are the urbanisation and industrialisation of the economy (Henrekson, 1988). Another factor expected to increase the public sector size is the openness of the economy. It enhances the role of the public sector as social insurer against external risk (Rodrik, 1998). A different perspective is obtained by considering the redistributive function of the state, which adds the impact of the relative income on the government growth. This is based on the consideration that economic growth can lead to rising unequality and therefore to votes for redistribution (Meltzer and Richar, 1981). The last demand-side theory showed in this part is Peacock-Wiseman's. According to their interpretation, the government share remains fairly stable over time. However, it increases stepwise as a consequence of major social disturbances such as wars that loosen the constraint imposed by the electors' willingness to pay taxes.

Supply-side theories of government growth:

Relaxing the neutrality assumption and allowing for bureaucrats and politicians to have preferences on the size and composition of public expenditure leads to supply-side aspects of government growth models.

Bureaucracy has the effect of increasing the size of government. The idea here is that public officers attempt to maximise the budget of the office they run because they can derive some private advantages in terms of higher 'salaries, perquisites of office, public reputation, power and patronage' (Niskasen, 1971), exploiting their informational advantage over citizens-electors.

The role of bureaucratic power is particularly emphasised by Brennan and Buchanan's (1980) Leviathan theory, where the government's main objective is to maximise its revenues, therefore transforming the benevolent public goods provider state into a malevolent revenue maximise entity, following Hobbes's Leviathan.

At last, fiscal illusion can also be considered as a supply-side factor of government growth. This can be captured by a proxy for the complexity of the fiscal system. The idea is that the agent-legislator exploits the fact that principal taxpayers cannot correctly ascertain their tax burden, therefore loosening the constraint on government expenditure imposed by the electors' willingness to pay taxes (Puviani, 1903)

Institutional factors:

The analysis of government growth in terms of demand and supply risks would be incomplete without the consideration of the institutional framework where decisions on government expenditure are taken. This is particularly important in the case of the European Union, within which essential reforms in terms of integration and fiscal federalism had been carried out over the years.

In particular, it is important to consider the constraints on government growth imposed at a supranational level by the Maastricht Treaty (1992) and the European Growth and Stability Pact (1997), which have a constitutional valence and therefore can be effective in limiting government growth. Indeed the Leviathan can be limited by imposing balanced budget constitutional rules and restrictions on the government's capacity to print money, with the ultimate restriction of denying government the power to create money under any circumstances at all. To a certain extent, this theory appears to have influenced the design of the EMU. The European Central Bank is statutorily independent from other European Union or national bodies, and the Maastricht criteria, followed by the Growth and Stability Pact, have the effect of imposing budgetary discipline at a constitutional level.

Another important institutional variable is given by the different levels of fiscal federalism observed in a country over time, as a consequence of the different equilibria reached over time between the two opposite tendencies of centralisation and devolution of state competencies to local governments.

Related to government size theories, it would be interesting to indicate other three theories which link the size of public sector and the modern economic environment, characterised by globalisation and decentralisation processes (Shadbegian, 1999). Although this study tests those theories from the United States, it can be also applied to the European Union due to their similar characteristics:

Wallis decentralisation hypothesis: He theorises that as fiscal decentralisation increases, state and local public expenditures increase and federal government expenditures decrease. Fiscal decentralisation is defined as the relation between lower (regional and local) government spending and total government spending.

Brennan-Buchanan decentralisation hypothesis: They indicate that as fiscal decentralisation increases, total government spending decreases.

Brennan-Buchanan collusion hypothesis*:* It is shown that collusion among the different levels of government leads to an increase in overall government spending and to an increase in spending at each individual level of government, because it weakens the disciplining power of fiscal federalism. Collusion is defined as the relation between the upper government's grants in aid to lower government and total lower government receipts.

These hypotheses have been shown in European countries over the last years, when a decentralisation process has started in each individual country, together with an increasing phenomenon of fiscal collusion or integration between different countries under the EMU discipline.

Measuring the size of public sector

With the purpose of providing a quantitative impression of the size of the State, it was needed to treat a certain number of definition questions. Firstly, what does it mean by ‘public sector’? For some categories of expenditure, such as the national defence, there is no doubt with respect to what is included. Nevertheless, many of the activities of the government looked much as private. Everything depends on whether anyone is interested in the aspect of the product passed or not passed by the market, or in the wideness of the governmental control (or other criteria). Once this wideness has been determined, it is precise to solve the question of the appropriate indicator to measure the magnitude of the activity of the government.

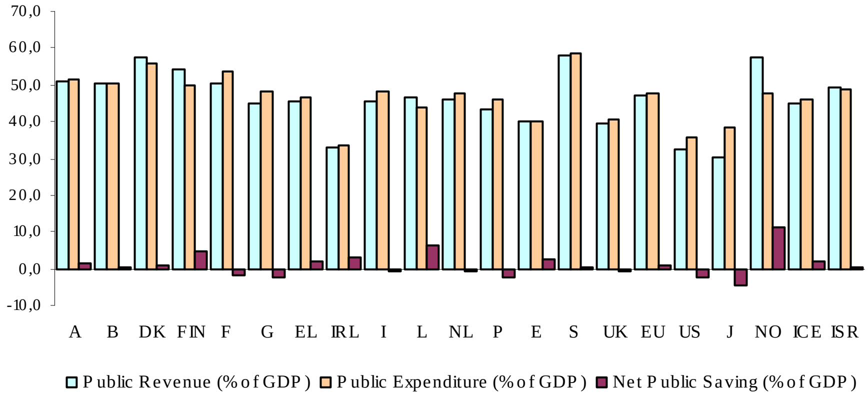
Secondly, in the case of goods and services supplied by the public sector (as they are, for example, national defence or public education) it has to consider the fact that the value of public expenditure in goods and services is measured, conventionally, by the value of the factors, instead of by the value of products. In other words, which it is measured is the cost of market of the resources used by the public sector. Nevertheless, this is not completely satisfactory. Whereas for most of the private goods can be discriminated the relative evaluation of individuals with respect to different goods, by means of the prices of market, the process to obtain a comparable measurement of the value of certain governmental services does not turn out so directly.

Thirdly, the transference payments are excluded from the national rent, since they only imply redistribution. And in case anyone is interested in the direct use of real resources in the public sector, then, the transferences would also have to be excluded from the public expenditure. On the other hand, it could be said that this undervalues the importance of the public activity and, therefore, that it would have to use gross measurements that include the transferences. Similar problems arise with the subsidies and the preferential tax treatments in general.

The existence of these well-known difficulties shows that there are several and different ways through which it can measure the dimension or the size of the public sector (for example, including or excluding the divisions of capital; including or excluding the payments from transference), and that there is a certain degree of abuse in any definition. This is the main reason why the numbers related to the magnitude of public expenditure, expressed as percentage of the GDP, and that are handled in the debates about the public sector, can differ so widely. Even more, this can be applied to another series of measures that are based on the public income by taxes, for example.

Consequently, any quantitative evaluation of the magnitude of the public sector must be observed with much precaution, and the empirical evidence showed in figures 3.1 and 3.2 has to take refuge without forgetting that qualification. These numbers show, respectively, the percentage of public figures in some European countries for the year 2003, as well as the participation of the tax income in the GDP for those countries and a classification that takes care of the types of more outstanding taxes.

Figure 3.1: Public figures in the European countries in 2002 (as % of GDP)

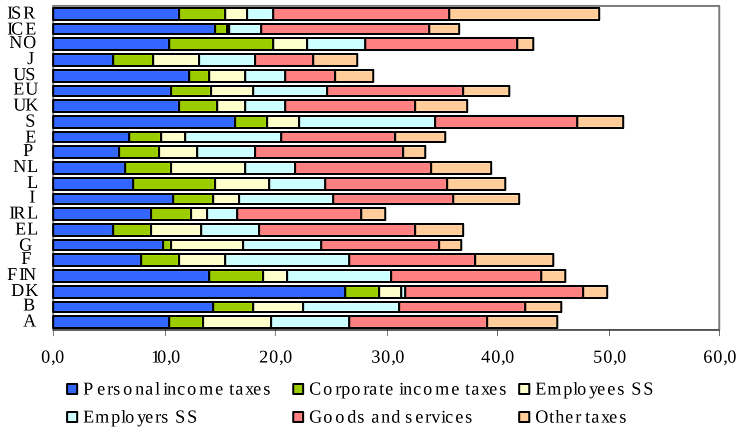


Source: Based on OCDE (2004)

Given the difficulties described above, it is only possible to reach very general conclusions, but it is obvious that can be extracted the magnitude of the public budget in figure 3.1 so that it is measured in terms of the total public expenditure or in terms of the total public revenue. They can be observed countries above 50% of GDP in public figures, such as the Nordic ones (Finland, Denmark and Sweden), France, Belgium and Austria. On the other side, countries such as Mediterranean countries (Spain, Portugal and Greece), have only around 40%-45%, and Ireland around 35%, near the levels of other countries such as Japan or the United States.

In terms of net public saving, almost all analysed countries, except Greece, Portugal and Japan, have positive public saving in 2000, but in 2003 other countries such as the United States, France, Germany, Netherlands, Italy or United Kingdom presents higher public expenditures than revenues. Besides, differences among countries exist. Whereas Norway surpass the 11% of its GDP, countries such as Ireland, Luxembourg, Finland and Spain, are located from 2.6% (Spain) to 6.2% (Luxembourg), and the remaining countries have levels of public saving less than or equal to 2% of their GDP. The European Union has relatively high levels on average, with a 0.9% of its GDP of public saving, more than three points higher than the one in the United States.

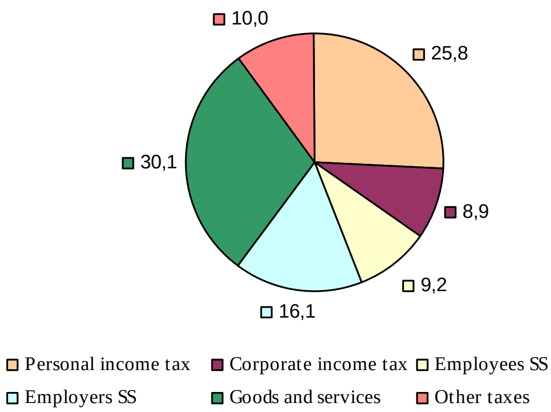
Figure 3.2: Taxation revenues in different countries 2002 (as % of GDP)



Source: Based on OECD (2004).

The participation of taxes in the selected countries in graph 3.2 show a wide range of variation: from over 50% of GDP (in Sweden and Denmark) to almost 35% (in Ireland and the Mediterranean European countries). By types of taxation on EU average (figure 3.3), taxes over goods and services accounts for by far the largest element, amounting to an average of 30.1% of the total taxes revenues of the Union in the year 2002, and with personal income taxes the second largest accounting for 25.8% of the total. Social Security contributions (so by employers as by employees) account for 25.3% of the total of public taxation revenue. Far from these, other taxes and corporate income taxes are located, which account for 10.0% and 8.9% of the total respectively.

Figure 3.3: The pattern of European taxation 2002



Source: Based on OECD (2004).

Because of this kind of problems of measuring the size of public sector, in 1986 UK Public Expenditure White Paper selects the ratio of general government expenditure to gross domestic product (at market prices) as the suitable measure (Beeton, 1987). However, adjustments to the National Income Accounts definition of government expenditure need to be made in order for it to be an accurate measure of total expenditure actually incurred. When these adjustments are made, the public sector is discovered to be larger, and growing more quickly than the Public Expenditure White Paper definition indicates. These adjustments could be made following different deflator indicators of public sector size, focusing on social expenditure (Mahler, 1992). Other authors, such as Karras (1997), abstract that the optimal government size for the representative European country is estimated by the study of the role of public services in the production process. The empirical results support the following conclusions: the optimal government size is 16% for the average European country, and the marginal productivity of government services may be negatively related to government size.

Importance of Public Sector in Europe:

In this part of our analysis it will be adapted, like measurement of the size of the public sector, the public expenditure in relation to the GDP of each country. Measured by the level of public expenditure, the weight of the public sector in the European Union, as it can be observed in table 3.1, is nowadays around 48.5% of the current GDP, like simple average of the European economies, surpassing in more than ten points to which it has in Japan, and twelve points and a half to which it reaches in the United States, which means a high dimension in comparison. However, there are important differences about this aspect among the EU countries.

Table 3.1: Total public expenditure in the European countries 1980-2003 (as % of GDP)

Countries	***1980***	***1990***	***2000***	***2003***
Belgium	57.0	53.1	49.9	51.0
Denmark	53.6	57.4	53.5	56.2
Germany	48.0	45.3	45.9	48.8
Greece	27.3	48.2	41.4	48.3
Spain	32.9	43.9	40.0	39.6
France	46.6	50.6	52.8	54.6
Ireland	48.0	39.5	32.0	34.3
Italy	42.9	54.3	46.5	49.0
Luxembourg	50.4	46.0	40.1	44.9
Netherlands	56.7	55.2	45.4	49.0
Austria	47.8	50.2	51.9	50.8
Portugal	41.0	40.1	44.6	47.8
Finland	39.4	46.8	48.7	51.1
Sweden	61.6	60.7	58.1	58.3
United Kingdom	43.1	43.4	40.2	43.6
European Union-15	46.2	48.9	47.0	48.5
United States	34.5	36.7	32.7	35.7
Japan	32.5	31.9	31.9	38.2

Source: Eurostat (2004).

Firstly, the relevance of the public sector is smaller in most of the countries of the south of the European Union (Spain, Portugal and Greece to be precise), and also in Ireland and the United Kingdom. But the reasons of that smaller public presence among these two groups of countries do not seem to be the same. In the case of Southern countries, all of them receive important amounts of EU structural and cohesion funds due to the their relative economic delay in GDP per capita and development. The case of the second ones, and mainly the United Kingdom, they link to a less interventionist conception from the public sector, closer to the North American scheme. In fact, the activity of Public Administrations in the countries of the Southern Union was still relatively more reduced in the 60s and 70s when also their levels of rent per head were relatively lower, having produced since then a process of convergence with the EU average, non-single in rent per head, but also in the dimension of the public sector.

However, the United Kingdom and Ireland are both countries in which the importance of the public activity has increased less in almost the forty years between 1960 and 2000, even though both have not followed parallel developments. Whereas in the United Kingdom a moderate raise of the public expenditure over the GDP is observed throughout this extensive period of time, in Ireland they oppose two evolutionary guidelines, having as a result a stagnation of the expenditure in the lowest level of the Union, 34% of the GDP: after a fast increase of the numbers of the public activity from 1960 to 1986, to reaching 51% of the GDP in the last year, a gradual and continuous slowdown takes place until this moment, almost coincident in time with the high incomes of resources coming from the Found of Cohesion of the European Union and the common budget. It is important to notice that Ireland presents at the moment one of the highest levels of GDP within the European Union, and does not receive these funds.

On the other hand, and due to the high importance of the public sector in their economies, it is important to put emphasis on France, Belgium and the Nordic countries, especially Sweden among them, where the weight of public expenditure over the GDP reaches 58.3% at present. In these countries the raise of the public expenditure has been almost as intense as in the Southern European countries, measured in percentage points over the GDP, but the departure level in the 60s was already very near the EU average. That is the reason why today the dimension of public activity in those countries it is so wide.

In any case, with some exceptions such as France, the dominant trend in the EU countries has been of slowdown during the decade of the 90s, in contrast to the observed trend in other countries, such as Japan, New Zealand, Switzerland or Norway during the last years. The reasons of this development are, on one part, a less interventionist conception of the EU governments, which seem to share the idea that today an excessive dimension of the public sector can be an obstacle for the economic growth, in agreement with the results obtained in diverse theoretical and empirical researches (Doménech and García, 1999).

On the other hand, within the limits established for the public deficits in the Pact of Stability and Growth signed in 1997 by all of them, that forces to finance the expansion of the public expenditure with new taxes, which is not easy because the tax levels in the European Union are already very high. For that reason, it is not possible to expect that the countries of Southern Europe increase significantly their relative importance of public expenditure in the future. Apart from that, these countries should revise the composition of its public spending to orient it less towards subsidies and current spending, more towards investment and efficient spending.

If instead of using the public expenditure as a measurement of the dimension of the public sector, the fiscal pressure or the current transferences to the households in relation to the GDP are used (table 3.2), similar results can be observed: the weight of the public sector in the European Union is higher than the one in the United States or Japan., The countries within the European Union belonging to the Found of Cohesion, together with the United Kingdom, are those that display lower levels.

Table 3.2: Measurement indexes of the public sector in the European Union 2002(as % of GDP)

Countries	Total spending	Public investment	Total current expenditure	Current transfers	Fiscal pressure	Social protection expenditure**
Austria	49,9	1,2	49,0	18,7	43,9	29,1
Belgium	53,5	1,6	55,9	15,3	45,7	27,8
Denmark	45,9	1,7	44,7	17,1	50,4	30,0
Finland	48,3	2,9	39,8	16,3	46,2	26,4
France	40,0	3,2	39,2	18,0	45,8	30,6
Germany	52,8	1,5	51,1	18,8	37,7	30,5
Greece	32,0	3,9	29,6	16,3	37,1	26,6
Ireland	46,5	3,9	46,6	8,2	32,3	16,0
Italy	40,1	2,6	39,5	16,8	43,3	26,1
Luxembourg	45,4	4,8	45,9	14,1	41,8	22,7
Netherlands	51,9	3,6	47,9	11,9	42,1	28,5
Portugal	44,6	3,4	39,4	12,1	34,3	25,4
Spain	48,7	3,5	49,7	12,3	35,1	20,2
Sweden	58,1	3,1	60,2	18,3	52,2	32,5
United Kingdom	40,2	1,7	39,8	13,4	36,3	27,6
European Union	47,0	2,4	45,6	15,2	41,6	28,0
United States	34,5	1,6	33,2	12,6	28,9	-
Japan	38,6	6,4	30,4	15,7	26,2	-

**2003 - Source: Eurostat (2004).*

In general, and coincident with the fact happening with public expenditure, the fiscal pressure increased in the period between 1960 and 1986, and a slowdown or stagnation took place later. But differences among countries exist. On the one hand, it is important to emphasise the strong growth experienced by the Nordic countries (Sweden, Denmark and Finland) and Belgium, where starting off of intermediate levels in the 60s have reached at the moment the highest levels of fiscal pressure. On the other hand, the Mediterranean countries (Spain, Portugal and Greece), where they started off of the lowest levels, multiply by four the level of taxation in the analysed period of time. Finally, it is possible to show, by its economic core, the stability that the fiscal pressure has maintained in countries such as Japan and, specially the United States.

The dimension of the public sector of the European Union as an institution can be measured by the percentage representing the budget of spending on the EU GDP, which at the moment is of 1.27%. It implies that the public sector in the Union is quite lower than it is in other federations of states (the United States or Switzerland, with 20% and 25% of their GDP respectively). The reduced weight of the public sector of the European Union has been a long-debated question by experts in the matter, who, in an extensive report on public financing (McDouglas et al., 1977) establish as the lowest level of reference of the public sector within the federal scope the 5%, far enough of the present reality. At sight of these results, it could be concluded that, having in mind the weight of the public sector, the Union is nearer to which it is known as "pre-federal integration", whose minimum level of reference for the public financing is set up in a 2%.

Almost half of the EU spending is allocated for the Common Agrarian Policy (CAP), being the rest absorbed mainly by the economic and social cohesion policy. But a gradual loss of importance of the CAP has taken place in benefit of the economic and social cohesion policy. This has been caused by the reform of the CAP in 1992, "*McSharry Reform*", and by the incorporation of less-developed countries to the Union, which has been translated in an increase of the differences of rent among the EU regions. Ahead the perspective of the new already signed extension to the Eastern countries, the economic and social cohesion policy is outlined like a still more important piece within the European Union.

On the other hand, the EU funds are complementary to the national ones, following the principle of which the confluence of interests in both levels must contribute to the reinforcement of the policy at issue, and to the attainment of better aims. The EU spending, then, usually complements the national and regional ones, according to the existing distribution circuit. There is still a national preference over the supranational functioning, which is related to the importance of the principle of redistributive justice. However, while the different members of the European Union use their fiscal systems for the three classic functions: as stabiliser, to allocate and to redistribute (Musgrave, 1969), the common property has to develop without the first of them, whose basic utility is to incur public deficits, since the EU budget must be balanced. The redistributive function assumes then a core importance, since the differences of rent among the different regions widely surpass the interregional differences within each State member, and duplicate the existing maximum differences in other supranational structures, such as the United States.

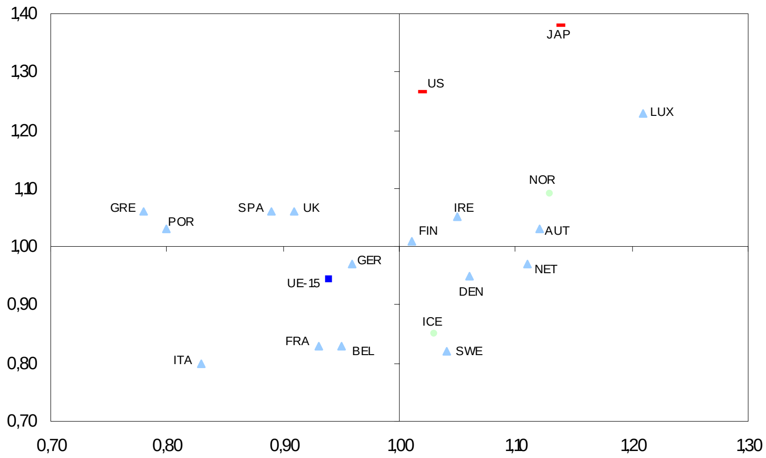
The existence of great disparities of interregional rent turns the redistributive function in an economic objective key in the European Union and leitmotiv of the economic and social cohesion policy. The function of allocating occupies, however, a second place, and its main instrument is the CAP.

Size and performance of the Public Sector and economic growth

Most empirical studies on public sector performance assess either the relative performance of specific producing units (e.g. hospitals) against each other, frequently using frontier analysis, or broad sector aggregates (e.g. health, education, or administration), assessing performance over time or across countries. Lack of internationally harmonised data often prevents cross-country comparisons of public sector productivity across countries. Cross-country studies on public sector efficiency frequently rely on indicators such as the educational achievement of school pupils at a given age, life expectancy, survey results on how managers perceive the functioning of justice, the extent of the corruption in a given country, or macroeconomic indicators (such as GDP per head, economic growth or income distribution).

Afonso et al. (2003) compute indicators of public sector performance (which describes the outcomes of public sector activity) and public sector efficiency (which relates the outcomes to resource use). To establish indicators to overall public sector performance, they use selected socio-economic indicators for public administration, education, health, infrastructure, income distribution, economic stability and economic performance.

Figure 3.4: Indicators of public sector efficiency and performance (axes: X = performance; Y = efficiency)



Source: Based on Afonso et al. (2003)

Figure 3.4 shows the relation between public sector performance to the efficiency in the European countries, US and Japan. It can be observed how Luxembourg, Japan and the US report high performance at a low cost in terms of public spending. The Netherlands, Denmark, Sweden and Iceland report above-average performance in the public sector, but this is achieved at a disproportionately high cost in terms of public expenditure. The countries close to the average efficiency line combine low public spending with low performance (Greece, Portugal, Spain and the UK) or higher performance with above-average spending levels (Norway, Austria, Ireland and Finland). Finally, Italy, France and Belgium, and to a lesser extent Germany, appear as relatively inefficient in their use of public resources, while they also score badly in terms of performance. Afonso et al. (2003) conclude that the higher performance and efficiency scores of small governments may suggest that the size of government could be too large in many industrialised countries, leading to the prevalence of declining marginal products.

The performance of the public service sector in particular can be measured by the score on four public sector functions: stabilization and growth of the economy, distribution of welfare, allocation of public services and quality of public administration (table 3.3).

Table 3.3: Indicators of the performance of the public service sector

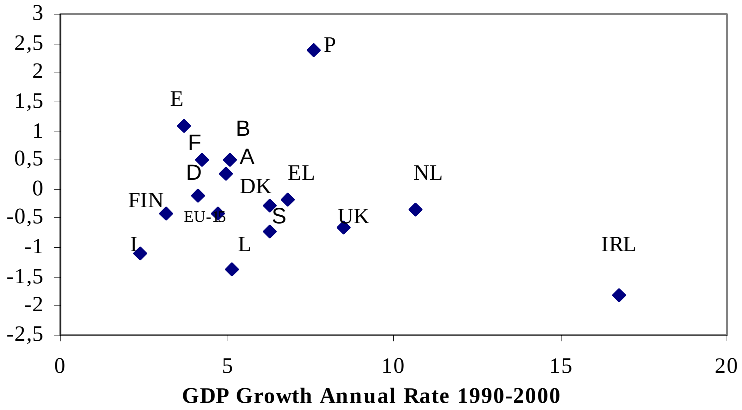
	Stabilization and growth of the economy	Distribution of welfare	Allocation of public services	Quality of public administration
Belgium	1.29	1.45	1.33	1.10
Denmark	1.38	1.61	1.32	1.71
Germany	1.13	1.61	1.16	0.93
Greece	1.23	0.89	1.37	0.82
Spain	1.27	1.05	1.32	1.26
France	1.16	1.21	1.33	1.21
Ireland	1.64	0.89	1.56	1.36
Italy	1.13	1.05	1.25	0.87
Luxembourg	1.72	1.53	1.15	1.66
Netherlands	1.33	1.69	1.24	1.31
Austria	1.37	1.53	1.34	1.39
Portugal	1.27	0.81	1.01	1.08
Finland	1.46	1.61	1.52	1.91
Sweden	1.37	1.61	1.34	1.50
United Kingdom	1.32	0.97	1.14	1.23
EU-15	1.34	1.30	1.29	1.29
United States	1.23	0.63	1.22	1.38

Source: SCP (2004)

Luxembourg and Ireland perform well in terms of stabilisation and growth. Of all EU-15 countries, Germany, France and Italy achieve the least satisfying results, mainly because of a rather poor performance on economic growth and budget deficits. New member states perform clearly less on the economic dimension, although their (with the exception of the Czech Republic) economic growth is high. The composite score indicating the quality of public administration shows a fairly wide range. Finland again has the higher score, followed by Denmark, Sweden and Luxembourg. Greece and Italy has the lowest scores. On allocation function of the public sector, Ireland and Finland score well above average. On the other hand, Portugal scores clearly below average. In terms of distribution of welfare, only the Scandinavian countries, Germany, and the Netherlands more or less make the Lisbon target (a poverty rate of 10%). Belgium, Luxembourg and Austria also have a fairly low poverty rate. A number of Southern European countries and the Anglo-Saxon ones record a poverty rate in excess of 18%. Table 3.3 offers a comprehensive overview of these performance indicators

The quest for economic growth is a third target seen as central to macro economics. Despite a large amount of theorising and empirical research the process of and recipe for economic growth has remained elusive. The focus of this analysis is rather more limited and is concerned with the connection between public sector size and economic growth. Clearly, economists of the Leviathan public choice school tend to support a view that sees a large public sector as detrimental to economic growth. In contrast, evidence of a correlation between GDP growth and the growth rate of government, and more weakly between GDP growth and the size of government (figure 3.5), have been associated with the argument that there is a strong positive externality between public and private sectors.

Figure 3.5: Relation between economic growth and size of public sector in Europe, Government Expenditure Growth Annual Rate 1990-2000



Source: Eurostat (2004).

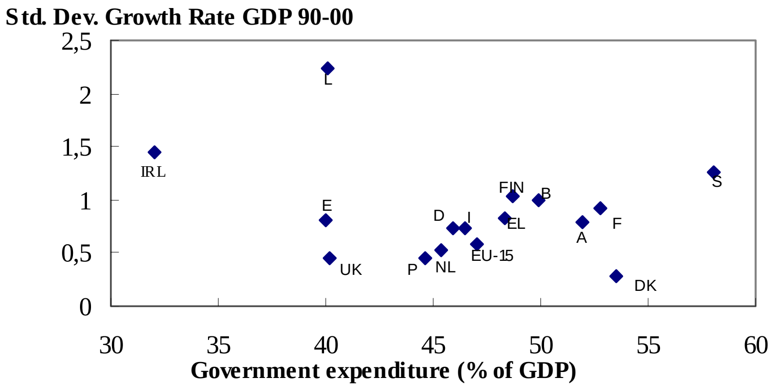
In Europe, because of the creation of a single currency area and the disappearance of national monetary policies, the debate has focused on the role that national fiscal policies can play and the need for a fiscal federation. The permanent limits on budget deficits set by the Growth and Stability Pact have been criticised for not leaving enough room for fiscal policy to smooth output fluctuations (Eichengreen and Wyplosz, 1998), although most economists agree with the Commission in the need of a certain stability Pact to guarantee coherence in the use of a common economic and monetary policy.

Fatás and Mihov (2001) document a strong negative correlation between public sector size and output volatility, so larger public sectors indicate higher economic stability. He defines public sector size as the relation between government spending and GDP, although other measures are used, such as the relation between government spending and the total output, or taxes between total output. The importance of the relationship between the average size of public sector is, as mentioned, two-folded. First, there is evidence that across countries public sector size is strongly correlated with conventional measures of automatic stabilisers like elasticities of transfers and taxes or the progressiveness of the tax system. Second, going beyond the effect of tax elasticities, the size of public sector spending might in itself be a significant determinant of the characteristics of business cycles.

Studying the effects of government size is one of the possible ways of analysing the stabilising role of public sector and it does not take into consideration other dimensions of fiscal policy. There are, however, several reasons why it is found that looking at public sector size provides a good starting point for the analysis of the stabilising role of governments. First, it can be argued that as long as the public sector is the safe sector in the economy, increasing its size will reduce the overall volatility of the economy (Rodrik, 1998). Second, the measurement of cyclical elasticities of fiscal variables is a difficult task and requires additional assumptions to uncover the structural relationship between those variables and the business cycle. Lastly, public sector size can be a proxy for the overall level of stabilisation provided by fiscal policy. There is evidence that, across European countries, public sector size and automatic stabilisers are strongly correlated.

The figure 3.6 reports a scatter plot of public sector size and the volatility of GDP for the sample of European Union countries. Public sector size is measured as the average ratio of government expenditure to GDP, and volatility is measured as the standard deviation of the growth rate of real GDP. Although no clear correlations stand at all, there might be some negative correlation under certain conditions for some countries, as first reported in Galí (1994).

Figure 3.6: Relation between stability and size of public sector in Europe



Source: Eurostat (2004).

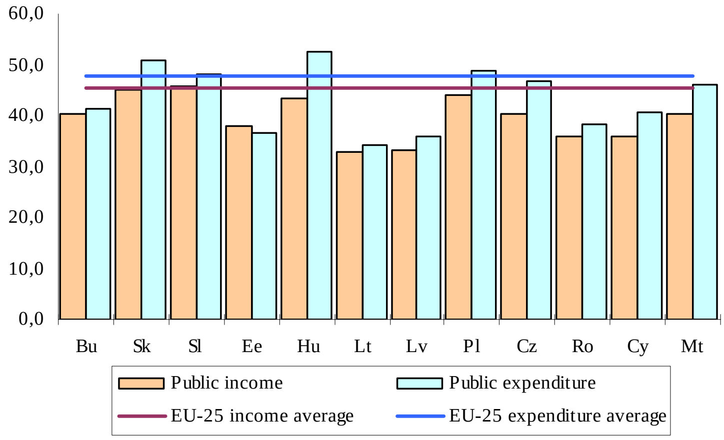
There is also a question of size and minimum fringe. The goodness of a large public sector is clear when comparing developed countries with consolidated public sectors and developing countries where public sectors are very weak. In other words, developed countries can afford large public sectors after a stable and consolidate systems of public spending and taxes. However, when just only the most developed countries are considered, the size of public sector is not necessarily good for the economy. Different economic and social strategies coexist and the composition of public sector becomes a fundamental question. Those countries reinforcing public investment and innovation, for example, perform much better than those reinforcing current spending, passive transfers and inefficient subsidies. These countries should move towards an ambitious program of structural and administrative and social reforms.

Fourth part: Public sector in the new EU member states

Introduction

Most of the countries that have asked for their adhesion to the EU have faced in the last years the transition from strongly interventionist economies towards a typical market model of the western European countries. At the present time, almost all the new EU member states register levels of public expenditure and income related to the GDP similar to those of the EU, although they are relatively high in comparison with other countries of similar levels of output.

Figure 4.1: Public income and expenditure in the candidate countries, 2002 (as % of GDP)



Source: Eurostat (2004)

The proportion of the public income and expenditure over the total production of the economy in these countries has been shown in figure 4.1. The information is in some cases referred, however, to different components from the Public Sector, the reason why the comparison among countries is difficult. These data indicate that the Baltic countries (Lithuania, Latvia and Estonia) are the States with a smaller percentage of public income and expenditure over the GDP. On the other hand, countries such as Slovakia, Slovenia, Hungary, Poland and the Czech Republic, present the higher levels. In comparison with the communitarian countries, the magnitude of the indicators of income and expenditure is lower. However, the size of the Public Sector in the post-communist countries is, in most cases, similar to which corresponds to the States members with a smaller level of public activity.

Following its evolution, it is easy to verify that public income and expenditure have followed very similar trends, except for Estonia and Lithuania in the scope of Central and Eastern Europe, and undoubtedly in the set of the Eastern Mediterranean countries, where the behaviour of both subjects throughout the time is more divergent. From the beginning of the 90s to nowadays, the decreasing of the public sector size in this set of countries has been remarkable. This fact is showed by two basic indicators: Firstly, the public sector, which in planned economies dominated completely the production, has been replaced by the presence of the private sector (nowadays, the private sector represents more than half of the total production in these countries[1]). Secondly, a very significant percentage of the public firms have been privatized in the last years.

The processes of privatization in these countries have constituted one of the main characteristics of these economies in the last years. In fact, the decreasing in the size of the public sector has been conditioned by the limitations of the transition towards market systems, but also by the need to reach a suitable fiscal discipline, threatened by the public firms. It is important to underline in this sense the Romanian case, in which their incapacity to follow their taxation obligations has supposed a source of very important macroeconomic unsteadiness.

In general, the privatization process has had a remarkable importance, as much by its amplitude as by its depth. In the case of Estonia, Slovakia and Hungary, this process has practically been completed. In fact, all the small and medium companies have been given back to the private sector, and only a much reduced set of great companies must to privatize. On the other hand, in the Czech Republic the program of privatizations is being revitalized again, after a massive process of sale of medium and great companies that turned out to be problematic, since a great proportion of the actions were acquired by banks and national funds that failed in the enterprise reconstruction. Another group of countries, such as Poland, Latvia, Lithuania and Slovenia, has followed a slower process of privatizations, at least as for the great companies. Finally, of the set of countries of central and Eastern Europe candidates to the adhesion, the slowest in the process of privatizations are Bulgaria and Romania. However, and according to data of the European Commission, Bulgaria had privatized in 2000 more of 72% of assets belonging to old state firms. On the other hand, the difficulties that have taken place in the Romanian program of privatizations have been caused, basically, by the high levels of debt in state firms.

Finally, the countries of the Eastern Mediterranean that have asked for their adhesion to the EU have developed processes of privatization of different intensity. Thus, Malta has been characterized by an intense process of privatizations, similar those followed in the countries of Central and Eastern Europe. Nevertheless, in Cyprus the public sector keeps handing activities

[1] The participation of the private sector in the total output, measured as a percentage of the GDP, surpasses approximately 70% for half of this set of countries, such as the Czech Republic and Hungary, holding 80% of the total production in private hands. On the other hand, Slovenia, Romania and Bulgaria are shown such as the countries with worst levels, which do no surpass 60%.

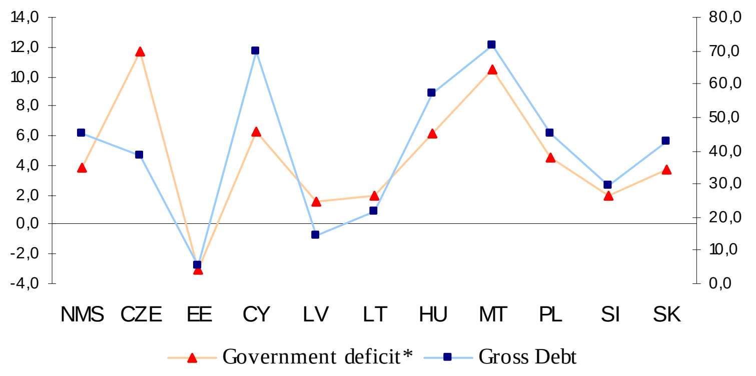
that could be in deprived hands, and has been more reticent to deepen in the privatization program. Finally, in Turkey the income by privatizations only very recently has started to be important.

The candidate countries to the adhesion have done, during the last years, important efforts in the profit of the macroeconomic stability. However, all of them have not obtained their objectives with the same degree of success. Thus, Bulgaria is the country that has reached a more important fiscal adjustment as a result of the strict discipline imposed by the monetary agreement, while Poland and Slovenia also have managed to maintain an important degree of fiscal stability. On the other hand, the Baltic countries have been seriously affected by the impact of the Russian crisis, with a reflection in their respective deficits; however, in the last years they have made a remarkable effort in this matter. Romania and Turkey still face the challenge to obtain this fiscal stability, although in the last case the program designed by the IMF would have force the reduction of the deficit of a significant way in the mid term. Finally, Cyprus and Malta have to face remarkable fiscal imbalances needing an urgent attention.

Related to the public sector debt, it is relatively smooth for the set of candidate countries, except for Bulgaria and Turkey. In the first case, however, in the last two years it has taken place an important fall in the percentage of debt related to the GDP, as a result of the greater rate of growth of the economy and the efforts directed to the fiscal consolidation.

As it is shown in figure 4.2, the fiscal policy of the last years has determined the present levels of public debt. Thus, those countries that have carried out reasonable policies, such as the Czech Republic, have obtained relatively reduced levels of debt. On the opposite hand, the accumulation of the fiscal deficits in other countries, such as Cyprus, has lead towards a continuous growth of the total debt. In general, the candidate countries have made considerable progresses in the cleaning of their economies. However, at this moment they maintain the commitment to get on with the process of fiscal consolidation and the structural reform of their public sectors. Although an important part of the way towards the convergence with the member states of the EU has already been covered, there is still much to advance.

Figure 4.2: Government deficit and gross debt in candidate countries, 2004 (% GDP)



**Government deficits are expressed in positive - Source: Eurostat (2004).*

The process of adhesion to the EU will change the volume of public expenditure and income of the involved countries, which, foreseeable, will be increased. In the scope of the public expenditure, the factors that press to the rise are many. Among them, it could be mentioned the need to fulfil the legal and institutional requirements ordered by the communitarian authorities, or the necessary approach to the environmental standards of the EU. In addition, most of these countries need to renew their infrastructures, and consequently, they will have to increase the public investment. Also, some of them have happened to belong to NATO, taking an agreement of increasing their defence spending in the next years, besides the expenditure that the reform of the social protection systems will suppose, affected seriously by the changes in the demographic structure.

By the side of the public income, it is expected to the new member states have access to an important level of structural communitarian funds and subventions for the agricultural sector. Finally, the adhesion to the EU will affect to the general functioning of the public sector in the candidate countries, through the reinforcement of the institutions that is being carried out in the previous stage. Due to this, the levels of efficiency could reach some improvements in the administration of the expenditures and taxes of the public sector.

The social protection in New Member States:

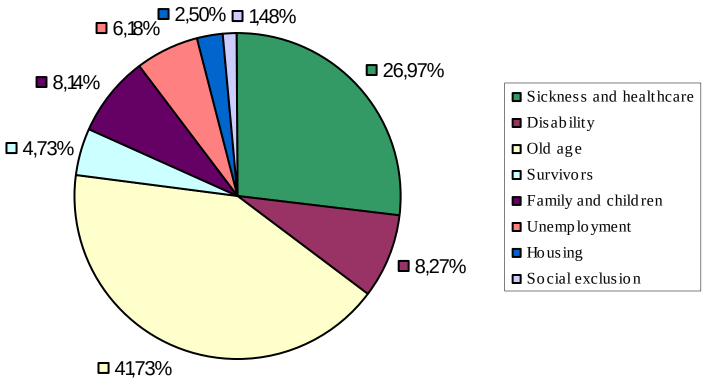
In the last decade, the Central and Eastern European countries that have asked for their adhesion to the EU have experienced important economic and social transformations related to the transition process from strongly interventionist economies to models of market economies. The budgetary pressures in these countries have been remarkable (especially in the middle of the 90s), and have resulted in the appearance of serious problems in the configuration of social protection systems. This trend continued until 1998, when a generalized improvement of the public finances took place and many reforms began in the systems of expenditure management, which made also possible the recovery of the current expenditures and, in many cases, the profit of suitable levels of social expenditure.

On the other hand, the perspective of the adhesion to the EU has forced to those countries to undertake important reforms during the last years, not only in their income sources (specially in their taxation systems), but also in the expenditure policies, with the purpose of obtaining a sustainability in the mid term and reaching models of social protection next to the communitarian ones. In general, the former schemes were characterized by the universal cover of the benefits, the presence of generous familiar allocations, varied options of anticipated retirement and free provision of health care. Those elements remain almost intact after the transition to a system of market economy, although modifications in the programmes of unemployment insurance and social welfare have been introduced with the purpose of helping the families to surpass the shocks derived from the transition process.

Social attendance policies in these countries are made up of a great number of programs of larger amplitude than the ones designed within the scope of the EU. In addition to the traditional benefits, diverse aids by spending in energy, monthly rents against the poverty, subsidies for transports, etc... are included. Although they are accustomed to be more generous in comparison with the international standards, they usually are badly managed, reason why they can not always fulfil their objective to light the worst situations of need. In addition, the management of the benefits is carried out by a multitude of varied institutions, which contribute to the duplicity of the expenditures and an increase of inefficiency in the allocation of public resources.

Referring to the main social benefits (their average social protection pattern is shown in figure 4.3) offered by this set of countries, it is suitable to underline some typical characteristics, although the proportions of each type of expenditure are very close to those in EU-25. Firstly, the established systems of pensions as distribution systems were initially designed with a highly complex and differentiated structure of benefits, that generated strong administrative problems, and with flexible criteria in the definition of the beneficiaries of the benefits. Also, the incentives to the anticipated retirement tended to increase the number of beneficiaries in relation to the number of contributors. Besides, there was much reduced contribution basis in comparison with the industrial countries, partly by the low proportion of the wages on the total repayment, and partly by the exemptions granted to certain types of workers. At this moment, the percentage of contributions on the GDP varies among countries, which suggests that the success in the extension of the contribution basis and the reinforcement of the fiscal fulfilment carried out in the last years have been different among countries.

Figure 4.3: Social protection pattern in New Member States, 2001



Source: Eurostat (2004)

Furthermore, the health systems structure is very similar in all the economies in transition. During the socialist period, extensive systems settled down, with universal and free accesses, which have undergone few structural changes during the transition. Between 1992 and 1996, the health expenditures underwent an important fall, specially the capital expenditures, and from 1997 on, they showed a slow recovery that has not always resulted in the increase of levels of suitable spending. Some countries, such as Bulgaria, Poland and Romania, continue financing the health expenditures with general taxes, while in other cases, such as in the Czech Republic and Hungary, systems based on the collection of social contributions have settled down.

The factors pressing on social expenditure are diverse: firstly, an increasing need of social transferences is registered due to structural unemployment and the increase in the demand of retirement pensions. On the other hand, important changes are forecasted in the long term within the demographic structure that will affect to the pensions system, with increases in the rate of dependency, and to the health expenditure. These problems, common to the EU countries, get deeper by some own circumstances of the economies in transition, that have inherited an unsuitable infrastructure and human capital for a market system and registered low levels of productivity referred to the international standards.

In addition, its structure to collect taxes is very limited, and the need for social protection is greater than in other countries due to the increase of the poverty in the last years and the high expectations generated by the programs of social welfare during the socialist period. Therefore, it is necessary to reduce the size of the social protection schemes to be able to reduce the fiscal pressure and to allow the growth of other spending, considering the need of a suitable level of social expenditure to mitigate the effects of the transition process on the poor people.

Considering this, the profit of the fiscal policy objectives will require a careful evaluation of the expenditure and its structure. The rationalization of the functions and the size of the public sector can help to improve the efficiency, to reduce the public personnel and to save money in the mid term. Until now, the reforms established in the last years have been designed with the short-term objective to rationalize programs of social protection and manage them suitably. In any case, it is necessary to extend the strategy of reform of the expenditure, especially within the scope of retirement pensions, which constitute the more expensive program within the social protection systems.

However, whatever it is the type of reform designed, the countries that have asked for their adhesion to the EU will have to continue with the trend of approach to the social protection programs of the communitarian countries, with the purpose of making their process of integration easier. In any case, the adoption of the communitarian rules and the basic attachment lines designed by the member states of the EU in the scope of social protection will mean for these countries a step ahead in the configuration of a suitable economic policy, which will also allow improving its economic results.

Tax systems in New Member States

Central and Eastern Europe countries

In most of these countries the percentage of the tax income over the GDP registered significant reductions since 1990. According to the numbers shown in the table 4.1, this indicator decreased yet between 1995 and 2000, except for the case of Latvia and Lithuania, which experienced a slight recovery of the tax collection. Bulgaria and Romania, however, have registered the most remarkable reductions during the last years, while Poland, after experiencing a strong slow-down in the tax income between 1990 and 1991, begins to recover slowly, although without reaching the previous levels to 1990. In comparison with the numbers shown for the EU, the percentage that tax income represent over the GDP is lesser than the communitarian average, although approximately half of this group of countries (Estonia, Hungary, Latvia, Poland and the Czech Republic) shows similar or upper levels than those of the member states with lower percentage (Spain, Greece, Ireland and Portugal).

On the other hand, the relative weight of personal income taxes between 1995 and 2000 experienced a slow-down trend. The percentage that these resources implies over the GDP is very below the communitarian average, and generally near the corresponding numbers to Greece, France, Portugal and Spain, that are the member states whose collection by this concept is smaller. Besides, the percentage referred to the tax on the enterprise benefits display greater similarities with the ones of the UE. In this case, a common evolution for all the countries is not registered, since decreasing behaviours as increasing ones in the percentages throughout the second half of the nineties are clearly observed.

Table 4.1: Economic dimension of tax income, 2001 (% GDP)

	Tax Receipts	Personal Income	Corporate Income	Social Security	Taxes on goods and services	Other
Bulgaria	26,6	4	5	6,9	10,3	0,4
Slovakia	32,3	3,5	2,2	11,3	10,7	4,6
Slovenia	-	-	-	-	-	-
Estonia	37,1	8,5	2,6	12,1	12,6	1,3
Hungary	39	7,6	2,4	11,4	15,1	2,5
Latvia	40,6	4,2	2,4	11,3	12	10,7
Lithuania	33,5	5,7	1,4	12,9	12,1	1,4
Poland	40	8,8	3	12,9	13,4	1,9
Czech Republic	38,4	4,8	4,2	15,0	11,7	2,7
Romania	26,8	5,6	4,3	7,1	7,7	2,1
Cyprus	24,6	-	-	4,9	-	-
Malta	27,4	4,8	3,2	6,5	8,5	4,4
Turkey	36,5	7,8	2,4	6,5	14,1	5,7

Source: OECD (2004).

Regarding the Social Security contributions, its relative weight is greater than in both previous cases, agreeing with the guideline followed by the EU countries. To a larger extent, these countries show similar percentages to those of the set of member states, being Bulgaria and Romania, around 7%, the most distant from the communitarian average (11%).

As for indirect taxes, the relative weight of the taxes on the sales is similar or upper than the communitarian average, except in Romania, where they have a remarkably smaller relative importance. Moreover, the percentages referred to special taxes are situated, approximately in half of the cases, below the average of the EU, and oscillate between 1.7% in Romania and 4% in Poland. Finally, the relative weight of the tax income derived from the international trade differs remarkably among countries. The percentage shown in the table indicate that these income represent a proportion of the GDP lower than the one corresponding to special taxes, but generally upper than the communitarian average.

The decrease of the tax income that has taken place in this set of countries since the beginning of the nineties has been conditioned by the effects of the economic recession and the financial crisis derived from the transition to a market system economy. The persistence of high rates of inflation has originated important losses in the real value of the income collection, and a generalized deterioration in the rates of fulfilment has taken place. The delays in the adaptation of the tax schemes to the changing economic surroundings have been very expensive, especially if it has in mind that the measures have consisted on measures of fiscal policy not accompanied by reforms in the tax administration, which has contributed to reduce its effectiveness.

In the middle of the last decade an introduction of reforms for the re-conversion of those fiscal systems towards a model of market economies began. A good example is the substitution of the tax on the sales by taxes on the added value. Also, at the end of the nineties, they were introduced reforms to impel the transparency of the fiscal system and to obtain a financial sustainability in the mid term in these countries.

Within the scope of the direct taxes, the last reforms that have been carried out in these countries have been directed, firstly, to simplify and extend the taxes basis, to reduce the marginal types and to articulate solutions for the distortions caused by inflation. Secondly, reforms in the taxes on personal income have been gotten up leading towards a tax on the global income (through the elimination of extensions and deductions). In order to face with the excessive fiscal load that falls on the labour factor, common problem to the economies of the member states of the European Union, the last reforms have the objective of reaching an additional reduction in the marginal types of the tax on the personal income and a cut of the social contributions, together with an increase of the tax basis of these latter.

At the present time, the structure of the corresponding tariff to the taxes on the personal income in these countries tends to converge with which correspond to the communitarian scope.

Then, within the framework of indirect taxes, important reforms have also been carried out, consisting basically on walking towards the homologation of the taxes on the added value to the communitarian rules (as much in tax types as in procedures), and on the convergence of the taxes on specific goods towards the levels of the EU. Recently, Romania has incorporated an ambitious fiscal reform that has consisted on the unification of the types of the VAT and the increase of the burdensome basis of the taxes on specific consumptions, together with a slope of their types. Slovakia, on the other hand, is moving the load of the direct taxes to the indirect ones, as result of a slowdown in the taxes on the personal income and an increase in special taxes. Slovenia has introduced the VAT in 1999, together with a new system of special taxes.

Finally, also the reforms that have been introduced in the scope of administrative procedures are numerous. Thus, it has tended to simplify the administrative structure (although in many cases it continues being excessively complex), it have been reinforced the controls to avoid fiscal frauds, the development of audit has been impelled and mechanisms of improvement in the information about taxes have been developed. This has tried compensating partially the loss of the tax collection derived from the slopes in the tax types.

East Mediterranean countries

As for these countries, the relative volume of the tax income is still less than in the rest of the candidate countries. Nevertheless, following the trend of those countries, the indirect taxes constitute the tax figures with greatest collecting power.

In this set of countries, the evolution undergone by the tax systems in Turkey and Malta is especially remarkable. In the case of Turkey the increases in the tax collection that took place in the second half of the nineties, derived from an increase in the wages and the retentions on the saving interests, and from an increase in the consumption, were limited by the weakness of the tax administration. At the present time, the fraud is much extended as a result of the low sanctions and the expectations of fiscal amnesties, which reduce the fulfilment of the tax obligations.

Furthermore, Malta has introduced significant changes in its tax system during the last decade, including a reform in the structure of the taxes on the personal income and in the scope of indirect taxes. The success of this tax reform has been outstanding: the income has increased and the taxes basis has been remarkably extended. At present, the tax system in Malta is close to those of the EU countries, since the necessary structural reforms have already been boarded.

In general, most of the countries put forward as candidates to the adhesion has adopted ambitious tax reforms during the last two decades, following the trends characteristic of the member states. Nevertheless, the total integration of this set of economies in the European Union demands deeper reforms. It is also necessary that this reform process of the tax administration gets completed if it is chosen at acceptable levels of tax collection, given the higher needs of public expenditure in those countries.

The effects of the next adhesion will have a net positive effect on the income of those economies: Income will be reduced as a result of the contributions to the communitarian budget, the rights of customs will be reduced and the administrative expenditures will be increased, all of which will arise from the need to establish new procedures. Also, some changes which these countries must face will be associated to substantial increases of the costs: for instance, it will be necessary to increase the expenditure of investment in order to stimulate regional development, reconstruct the legal system, reach the environmental standards demanded by the EU, to improve the transport and communications networks, rebuild companies and the Bank, or modify the social protection systems. Nevertheless, it is likely the volume of transferences of the European Union (arising from the CAP, the structural Found of Cohesion and structural funds) and the greater tax collection coming from an increase of the production (through taxes on personal income and TAV) to compensate the negative effects of the adhesion.

Other Policies on Public Expenditure and Income in New Member States

The structure and composition of public expenditure in this group of countries are determined by the change of the economic system in which they have been immersed during the last decade. In most of the economies in transition, public expenditure represents a very high percentage of the GDP. However, the spending levels have not reached the standards of the EU yet, and their structure is far from being suitable: while the public investment is very low, the expenses in wages and transfers (above all those destined to social programs) are very high.

The budgetary pressures suffered by those countries in the last years have been basically solved with two kind of measures: firstly, through adjustments in the most discretionary divisions of public expenditures, such as defence, industrial or agricultural subsidies, or public investment in general; secondly, by means of important delays in the payment of wages and transferences, so the level of public debt has risen notably.

Since the transition towards a market economy model began, a process of slow transference of certain responsibilities of expenditure towards the local and regional governments has taken place in some of those countries (such as educative or house spending). However, these actions have not always been accompanied by enough monetary transference, which has lead to a deterioration of regional and local budgets. Nowadays, many governments are carrying out institutional reforms intending to rationalize the operations of the Public Sector and to reinforce the intergovernmental fiscal relations.

Besides the consolidation of the relations among the different government levels, the rationalization of the Public Administration in these countries requires a new global concept of expenditure. This revision must be concentrated in pointing out the main objectives (specially identifying key investment projects around the scope of infrastructures and environment), eliminating some functions that had been handled by the public sector so far, and reducing the number of public employees and reforming them. Also, it is necessary to reinforce the control systems of public expenditure, that in many cases are basically limited at the state level, without affecting the rest of lower levels. Most of those countries have already started successfully to perform these kinds of reforms.

In many cases that group of countries has the technical attendance of international institutions, as the World Bank, to reach more modern ways of management and structures of public expenditure. Moreover, the EU has begun in 2000 to offer financial support to those countries, directed to environmental and infrastructural projects, through the Structural Policies Instrument for the Pre-adhesion, aiming to facilitate the economic conditions necessary to belong to the Union.

This process of convergence, nevertheless, will require a period of adaptation in the behaviour of public sectors, who originally respond to very different economic and political contexts. Considering the quantitative importance of some relevant policies to emphasize the public sector performance in the European countries, such as the public expenditure in education, health or defence, it can be observed great differences yet.

Final remarks: Comparison with EU member countries

In the last years, all the candidate countries have faced a strong transition from strongly interventionist economies towards market models. Due to this development, at present they register levels of public income and expenditure related to the GDP similar to those of the EU, although they are relatively high compared to other countries of similar levels of output.

As it can be observed in table 4.2, that group of countries present an economic situation worse than present member countries'. Only Cyprus shows a GDP per capita level similar to the EU average (around 85%). Slovenia', Czech Republic' and Malta's levels are between 50 and 75% of the EU average, while most of the candidate countries show economic levels under the half of EU average. Other countries, such as Romania, has levels under 25% of the EU average, very far from the top economic European countries, such as Luxembourg, Denmark, Belgium, the Netherlands or Ireland.

In contrast, those candidate countries have shown in the year 2000 higher GDP growth rates than the EU average (3.3 points related to previous year). Only Slovakia, Czech Republic and Romania had lower rates that year. This fact opens the door to a possible future convergence with present EU member countries.

Table 4.2: Economic and Public Sector level of candidate countries related to EU average(2000)

	Economic Indicators			Public Finances (%GDP)	
	GDPpc	GDP growth	Density population	Public income	Public expenditure
Bulgaria	6083	5,8	74	40,3	41,2
Slovakia	10814	2,2	82	27,8	29,7
Slovenia	15546	4,6	130	43,1	43,9
Estonia	8336	6,9	33	36	40,7
Hungary	11265	5,2	108	43,6	47,4
Latvia	6534	3,9	37	36,5	40,1
Lithuania	7435	6,6	57	32,9	40,7
Poland	8787	4	1234	21,1	23,2
Czech Republic	13293	2,9	124	38,8	40,3
Rumania	5407	1,6	94	17,9	20,5
Ciprus	19150	4,8	110	31,9	36,9
Malta	12391	5,4	98	34,9	43,5
Turkey	5858	7,2	84	23,9	21,8
EU-15	22530	3,3	118	44,6	42,3

>100%	75-100%	50-75%	25-50%	<25%

Source: Eurostat (2004) and OECD (2001)

If it is observed their evolution, the public income and expenditure of those candidate countries have followed very similar trends, except for Estonia and Lithuania. From the beginning of the nineties to the present, the decreasing of the public sector size has been remarkable. This fact is shown by two basic indicators: the privatisation processes of public firms and the greater presence of the private sector in the national production.

Related to the public sector debt, it is relatively smooth for the set of candidate countries, except for Bulgaria and Turkey, although in the first case, an important fall in the percentage of debt has taken place as a result of the greater rate of growth of the economy and the efforts directed to the fiscal consolidation.

As it is shown in table 4.3, the fiscal policy of the last years has determined the present levels of public debt. Thus, the accumulation of the fiscal deficits has lead towards a continuous growth of the total debt. Although in general the candidate countries have made considerable progresses in the cleaning of their economies, they maintain at this moment the commitment to get on with the fiscal consolidation process and the structural reform of their public sectors, because only Estonia, Bulgaria, Slovenia and Latvia present government deficits under 3% (level settled by the Stability and Growth Pact of the European Union). The other candidate countries are over this level, and some of them, such as Slovakia, Malta and Turkey, are over 6% and 11% respectively, very far from the necessary levels of admission to the EU.

Table 4.3: Government deficit in candidate countries related to EU levels (2000)

	Bulgaria	*Slov-akia*	*Slov-enia*	*Estonia*	*Hungary*	*Latvia*	*Lithu-ania*	*Poland*	*Czech Republic*	*Rom-ania*	*Cyprus*	*Malta*	*Tukey*
Government Deficit (%)	0.7	6.7	2.3	0.7	3.1	2.7	3.3	3.5	4.2	3.8	3.2	6.6	11

EU levels < 3%	3% < x < 6%	> 6%

Source: Eurostat (2004) and OECD (2001)

As it has been shown, the social protection system in those countries has suffered a huge transformation linked to the social and economic transition which they have undergone since the nineties. The former schemes were characterized by the universal cover of the benefits, the presence of generous familiar allocations, varied options of anticipated retirement and free provision of health care. These elements remain almost intact after the transition to market economies, although modifications in the programmes of unemployment insurance and social welfare have been introduced, with the purpose of helping the householders to surpass the shocks resulting from this process.

In order to manage these social needs, the tax systems are very important in those countries. However, the taxes over the GDP have decreased since 1990 to get a similar system to the EU present members. So, one of the most important aims of that group of countries is to solve this two-fold matter in the coming years. In comparison with the numbers shown for the EU, the percentage of taxes over the GDP is less than the communitarian average, although Estonia, Hungary, Latvia, Poland and the Czech Republic show similar or upper levels than those of the member states with lower percentage, such as Greece, Spain, Ireland or Portugal.

Regarding Social Security contributions, their relative weight is greater than the one of income taxes, agreeing with the guideline followed by the EU countries. To a larger extent, those countries show similar percentages to those of the set of member states, being Bulgaria, Malta and Romania (around 7%), Cyprus and Turkey (around 4%), and Slovakia (2.8%) the most distant of the communitarian average (11% of the GDP).

In the case of indirect taxes, their relative weight is similar or upper than the communitarian average, except in Romania. And lastly, the percentage of special taxes is also below the EU average, like in most of the other indirect taxes. But the effects of the future adhesion will have a net positive effect on the income of these economies, so the tax system will must be reformed.

In conclusion, the structure and composition of the public expenditure and income in that set of countries are determined by the change of the economic system in which they have been immersed during the last years. This process has originated important budgetary pressures, which have been solved through fiscal adjustments and an increase of public debt. However, whatever the type of reform is, the candidate countries will have to go on with the trend of approach to the structure and performance to the communitarian countries, with the purpose of making integration easier. In any case, the adoption of the communitarian rules and the basic attachment lines designed by the EU will mean a step forward in the configuration of a suitable performance of the public sector, which will also allow improving their economic results.

Final remarks

The modern public sector is a consequence of a long and even controversial process where different organisational models, sizes and profiles have been evolved. But, in any case, the State is actively present in social and economic life. Economic life constantly depends on the economic decisions of the governments, which can be illustrated in the taxes we pay. Almost everybody, receive at any time transferences from the government, such as the Social Security programmes. An important quote of the workers is paid by the State or produce goods betrayed by the public sector. Many children go to public schools, everybody enjoy public parks, highways and other services or infrastructures. More recently, many people are interested in the public politics from the environmental point of view, as the authority in charge of preserving natural resources and promoting sustainable development.

The structure, size and performance of the public sector is subject to generally fiery debate in Europe. Whereas, in the 1990s other aspects received a great deal of attention, in recent years the focus has shifted to failing public sector performance and behaviour. Thus, the aim of this report has been to present the basic figures and economic dimensions of public sector in the European countries, related to other main economies, such as United States and Japan. In addition, it intends to be an introductory contribution to the PUBLIN project because the study of innovation in public sector can be introduced by a preliminary analysis about its structure, role and basic economics. This is particularly important in a Europe where different models, sizes, and organisational ways do exist. The significance and impacts of innovation in public administrations will be affected by differences in their sizes, performances, and socio-economic organisations.

By adopting the Lisbon Agenda, member states of the European Union set themselves in 2000 the daunting task of making the Union the most competitive economic area in the world. Four years on, it seems increasingly doubtful whether this ambitious mission can be successfully completed. Anyway, the pattern and performance of the public sector of national economies is a crucial factor in the race to achieve the goals included in the Lisbon Agenda. Countries can try to improve the functioning of their public sector by adopting best practices found in other nations. The present report has been written with these purposes in mind. It had compared the structure, size and performance of the public sector (in general) in the twenty five nowadays EU member states, United States and Japan, tracing the differences (in terms of public figures, performance, welfare state and social protection structures, culture and administrative systems, and role of public sector in the aggregate economy) of all countries concerned, and identifying institutional factors that might help explain the differing performance of nations.

Many definitions can be found of the term ‘public sector’ in economic literature (legal, financial and functional are the most extended ones), but in this report the functional one has been applied. The role of public sector is performance a number of tasks which cannot simply be left to the market, such us the provision of ‘public goods’ and other ‘private goods’ with major externalities, the equitable distribution of the incomes, the achievement of economic growth and stability,… And like most large organisations, the public sector operates at many levels (general, regional and local). Growing demands and declining confidence in public sector have prompted governments to initiate structural policies aimed at trimming the public sector and increasing its efficiency and effectiveness. Reform strategies adopted can be catalogued as maintain, modernise, marketise and minimise the public sector structure and organisation.

Although all countries in the European Union have their own specific features with respect to their arrangements, it is possible to classify most countries into five general welfare state regimes. Three of them are comparable with those originally discussed by Esping-Andersen in his book ‘The three worlds of welfare capitalism’ (1990) and are also supported by other analyses: the Nordic or social-democrat, the Continental or corporatist, and the Anglo-Saxon or liberal regimes. Diverse studies on administrative systems and cultures in Europe agree at some extent with these country clusters. Thus, Denmark, Sweden and Finland are placed into the Nordic group, while Germany, France, Austria, Belgium and Luxembourg emerged as Continental countries. The UK and Ireland, along with other non European countries such as United States, Canada or Australia, belong to the Anglo-Saxon states.

Besides the three regimes suggested by Esping-Andersen, two others can be identified. In line with the theoretical observations of several authors, there is a Mediterranean or Latin regime, represented by Spain, Greece, Portugal and Italy. When this classification was developed, no attention was paid to the former Eastern Bloc countries. However, Poland, Hungary, the Czech Republic, Slovakia, Slovenia, Estonia, Latvia and Lithuania had joined the EU in 2004, as well as Cyprus and Malta. These countries can be clustered into another different group, although with similar characteristics to other regimes in some aspects. Finally, two countries can be identified as 'hybrid'. The Netherlands is classified between the Continental and Nordic regimes, while Norway has both Nordic and Anglo-Saxon features.

It is observed that general government size and its growth can be modelled no only in terms of demand-side theories, but also in terms of supply-side ones and institutional factors based theories. Although the role of size of the public sector in the performance and evolution of the economy has been largely treated in the economic literature, it is demonstrated the existence of so known difficulties on measuring the size and importance of public sector. Measured through the level of the public expenditure or any other indicator the results are similar. The weight of the public sector in the European countries is at the moment around the 48% of the current GDP, surpassing clearly to which it has in Japan and United States. This supposes a high dimension of the public sector. However, important differences among countries exist in this aspect. The relevance of the public sector is smaller in most Southern and Anglo-Saxon European countries (Spain, Greece, Portugal, Ireland and United Kingdom). In the other side, they can be found countries such as France, Belgium and the Nordic ones (especially Sweden), with higher numbers of the public sector. In any case, with some exceptions such as France, the dominant trend in the EU has been, during the 1990s, a decline in the size of the public sector, in contrast with the observed trend in other countries, such as Japan, Switzerland or Norway.

Finally, in terms of performance of the public sector, moderate differences can be found across European countries. Unsurprisingly, countries with small public sectors report the best economic performance while countries with large public sectors show more equal income distribution. When weighting performance by the resources used to achieve it, there are important differences across countries. Thus, countries with small public sectors report significantly higher public sector efficiency indicators than countries with medium-sized or big public sectors. All these findings suggest diminishing marginal products of higher public spending.

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Statistical appendixes

APPENDIX TABLES AND FIGURES

1. Public Sector Figures:

Table A.1: Government sector data, 2002 (as % of GDP)

	% Revenue	% Expenditure	% Final consumption	% Social Security transfers	% Net saving	% Net lending
Belgium	50.5	50.5	22.3	16.1	0.5	0.0
Denmark	57.4	55.8	26.3	17.5	1.0	1.6
Germany	45.0	48.5	19.2	19.4	-2.3	-3.5
Greece	45.3	46.8	15.7	16.4	2.2	-1.5
Spain	39.9	39.9	17.8	12.3	2.6	-0.1
France	50.2	53.5	23.9	18.0	-1.9	-3.3
Ireland	33.1	33.3	15.1	8.4	2.9	-0.1
Italy	45.6	48.0	19.0	17.0	-0.7	-2.4
Luxembourg	46.7	44.0	17.8	15.6	6.2	2.7
Netherlands	45.9	47.5	24.5	11.8	-0.8	-1.6
Austria	50.9	51.3	18.4	18.6	1.5	-0.4
Portugal	43.2	45.9	21.2	13.0	-2.2	-2.7
Finland	54.4	50.1	21.7	16.8	4.6	4.3
Sweden	58.1	58.3	28.1	17.5	0.5	-0.3
United Kingdom	39.4	40.7	20.1	13.5	-0.5	-1.3
EU-15	47.0	47.6	20.7	15.5	0.9	-0.6
Iceland	44.9	46.0	25.5	7.9	2.1	-1.1
Norway	57.6	47.5	21.8	14.8	11.1	10.1
United States	32.6	35.7	15.6	12.1	-2.2	-3.1
Japan	30.3	38.2	17.7	10.9	-4.8	-7.9
Israel*	49.1	48.8	27.7	11.7	0.3	-2.4

Table A.2: Size of Public Sector in Europe, 2003 (as % of GDP)

	General Government output	Final Consumption Expenditure of General Government*	Government investment
Belgium	17.1	22.8	1.6
Denmark	28.4	26.6	1.7
Germany	13.2	19.2	1.5
Greece	17.5	16.0	3.9
Spain	16.4	17.9	3.5
France	22.0	24.3	3.2
Ireland	15.5	15.9	3.9
Italy	18.3	19.5	2.6
Luxembourg	15.0	18.2	4.8
Netherlands	20.3	25.4	3.6
Austria	15.1	18.0	1.2
Portugal	20.9	21.3	3.4
Finland	25.3	22.2	2.9
Sweden	29.6	28.3	3.1
United Kingdom	22.9	20.9	1.7
EU-15	19.0	21.0	2.4
*Israel***	14.3	27.7	1.4

**2000 instead of 2003 - Source: Based on Eurostat (2004*

Table A.3: Growth of size in public sector (annual average accumulative growth rates, in %)

	General Government output	*Final Consumption Expenditure of General Government*	*Government investment*
	1995-2003	1995-2003	1995-2003
Belgium	0.4	0.8	-2.1
Denmark	0.4	0.4	-0.7
Germany	-1.3	-0.4	-5.2
Greece	0.6	0.6	2.5
Spain	-0.4	-0.1	-0.7
France	0.1	0.2	-0.4
Ireland	-0.9	-0.5	6.8
Italy	0.8	1.1	2.7
Luxembourg	-1.3	-0.1	0.5
Netherlands	0.3	0.7	2.3
Austria	-3.9	-1.4	-10.8
Portugal	1.2	1.7	-1.1
Finland	-0.6	-0.3	0.4
Sweden	-0.3	0.5	-3.1
United Kingdom	1.0	0.9	-3.2
EU-15	0.1	0.2	-1.0
*Israel**	-	5.6	-5.1

**2000 instead of 2003. Source: Based on Eurostat (2004*

Table A.4: Public expenditure by type, 2003(As % of total)

	General public services	*Defence*	*Health*	**Education**	*Total*
Belgium	9.6	1.2	7.0	6.3	51.0
Denmark	8.1	1.6	5.8	8.5	56.2
Germany	6.3	1.2	6.5	4.1	48.8
Greece	9.1	3.6	2.9	3.6	48.3
Spain	-	-	-	-	-
France	6.3	3.0	7.9	6.3	55.2
Ireland	7.3	1.1	6.2	5.1	41.6
Italy	9.1	1.3	6.5	5.2	49.0
Luxembourg	4.9	0.3	5.3	5.4	45.5
Netherlands	8.0	1.5	4.7	5.2	49.0
Austria	7.5	0.9	6.6	5.8	50.8
Portugal	7.5	1.3	7.1	7.0	47.9
Finland	-	-	-	-	-
Sweden	7.9	2.1	7.3	7.4	58.5
United Kingdom	4.8	2.7	6.8	5.3	43.5
EU-15	8.8	1.9	5.9	5.6	51.9
*Israel**		12.6	7.8	5.6	26.0

**2000 - Source: Based on Eurostat (2004)*

Table A.5: Growth of public expenditure by type in Europe, 1995-2003 (annual average accumulated growth rates)

	General public services	Defence	Health	Education	Total
Belgium	-3.0	-2.8	1.5	-0.2	-0.5
Denmark	-3.5	-1.5	1.6	1.2	-0.9
Germany	-0.8	-1.9	0.2	-1.2	-1.7
Greece	-7.4	3.7	-2.0	1.1	-0.7
Spain	-	-	-	-	-
France	-	-	-	-	-
Ireland	-	-	-	-	-
Italy	-5.3	1.0	2.1	0.7	-1.1
Luxembourg	0.8	-8.3	-0.7	1.0	0.0
Netherlands	-2.8	-2.9	2.4	0.2	-1.7
Austria	-2.4	-1.3	-1.9	-1.0	-1.2
Portugal	-1.8	-6.4	3.7	0.9	0.8
Finland	-	-	-	-	-
Sweden	-5.0	-2.2	1.7	0.5	-1.8
United Kingdom	-2.4	-1.7	2.5	1.5	-0.4
EU-15	-2.3	-1.8	0.6	0.5	-0.5
Israel*		-8.0	-3.7	-8.2	-6.8

**2000 instead 2003 - Source: Based on Eurostat (2004)*

Table A.6: Public Debt and public deficit/surplus, 2003 (% of GDP)

	Gross Consolidated Public Debt	Budget deficit/surplus
Belgium	100.7	0.4
Denmark	45.9	0.3
Germany	64.2	-3.8
Greece	109.9	-4.6
Spain	50.7	0.4
France	63.7	-4.1
Ireland	32.1	0.1
Italy	106.2	-2.4
Luxembourg	5.4	0.8
Netherlands	54.1	-3.2
Austria	65.1	-1.1
Portugal	60.3	-2.8
Finland	45.6	2.3
Sweden	52.0	0.3
United Kingdom	39.8	-3.3
EU-15	64.3	-2.7
Iceland	41.3	-1.4
Norway	42.0	8.3
United States	62.7	-4.7
Japan	157.6	-8.0
Israel*	-	-0.1

**2000*

Source: Based on OECD (2004) and Eurostat (2004)

Table A.7: Government finances, 2003 (As a % of GDP)

	Current taxes	Social contribution	Total general government revenue	General Government gross fixed capital formation	Total general government expenditure
Belgium	31.5	14.4	51.3	1.6	51.0
Denmark	47.1	1.7	57.2	1.7	56.2
Germany	23.2	17.5	45.0	1.5	48.8
Greece	23.4	12.9	43.6	3.9	48.3
Spain	23.5	12.8	40.0	3.5	39.6
France	27.3	16.6	50.4	3.2	54.6
Ireland	25.3	4.6	34.4	3.9	34.3
Italy	30.1	12.9	46.5	2.6	49.0
Luxembourg	29.9	11.5	45.6	4.8	44.9
Netherlands	24.8	14.5	45.8	3.6	49.0
Austria	28.5	14.6	49.5	1.2	50.8
Portugal	25.5	11.7	45.0	3.4	47.8
Finland	32.9	12.1	53.2	2.9	51.1
Sweden	36.2	14.4	58.4	3.1	58.3
United Kingdom	29.3	7.3	40.1	1.7	43.6
EU-15	27.4	13.4	45.8	2.4	48.5
Israel*	21.9	7.4	49.1	1.4	48.8

*2000

Source: Based on Eurostat (2004)

Table A.8: Taxation figures, 2002 (as % of total taxes)

	Personal income taxes	Corporate income taxes	Employees Social Security	Employers Social Security	Taxes in goods and services	Other taxes
Belgium	31.6	7.9	9.8	18.9	24.6	7.1
Denmark	52.7	6.3	3.8	0.7	32.2	4.4
Germany	27.1	1.7	17.5	19.5	28.8	5.4
Greece	14.7	9.2	12.0	14.4	37.9	11.8
Spain	19.6	8.1	6.0	24.7	29.3	12.4
France	17.7	7.6	9.0	24.9	25.2	15.5
Ireland	29.7	12.1	4.4	9.4	37.3	7.0
Italy	25.9	8.6	5.5	20.1	25.6	14.2
Luxembourg	17.7	18.3	12.0	12.4	26.6	13.1
Netherlands	16.3	10.4	17.1	11.5	30.7	13.9
Austria	22.9	6.9	13.4	15.7	27.1	14.0
Portugal	17.9	10.8	10.0	15.4	40.0	5.8
Finland	30.5	10.6	4.8	20.0	29.4	4.6
Sweden	31.9	5.7	5.6	23.6	25.1	8.1
United Kingdom	30.2	9.5	6.8	9.6	31.3	12.6
EU-15	25.8	8.9	9.2	16.1	30.1	10.0
Iceland	39.8	3.2	0.2	7.9	41.5	7.4
Norway	24.2	21.7	6.9	12.3	31.3	3.5
United States	42.3	6.5	10.8	12.5	16.1	11.8
Japan	20.1	12.7	15.1	18.8	19.0	14.4
Israel*	23.1	8.3	4.2	4.6	32.3	27.5

*2000

Source: OECD (2004)

Table A.9: Another item about taxation, 2002

	Highest personal income % tax	***Highest corporate % tax***	***Taxes / Total receipts by general government***
Belgium	52.1	40.2	45.8
Denmark	54.3	30.0	49.8
Germany	51.2	38.9	36.8
Greece	42.5	37.5	36.9
Spain	48.0	35.0	35.2
France	47.3	36.4	45.0
Ireland	42.0	20.0	29.9
Italy	45.9	36.0	42.0
Luxembourg	43.1	37.5	40.7
Netherlands	52.0	35.0	39.5
Austria	50.0	34.0	45.4
Portugal	35.6	35.2	33.5
Finland	52.5	29.0	46.1
Sweden	58.2	28.0	51.4
United Kingdom	40.0	30.0	37.3
EU-15	47.6	33.5	41.0
Iceland	43.1	30.0	36.5
Norway	47.5	28.0	43.3
United States	46.1	45.5	28.9
Japan	45.5	40.9	27.3
Israel	-	-	-

Source: OECD (2004)

2. Welfare State:

Table A.10: Social protection in Europe, 2002

	Total expenditure at current prices as a % of GDP	Total expenditure per head in euros	Social protection receipts by general government contributions as % of total receipts
Belgium	29.1	7003	34,3
Denmark	30.0	10205	65,9
Germany	30.5	7788	41,7
Greece	26.6	3544	45,7
Spain	20.2	3470	39,2
France	30.6	7633	44,0
Ireland	16.0	5273	70,9
Italy	26.1	5749	61,3
Luxembourg	22.7	11596	52,0
Netherlands	28.5	7852	46,3
Austria	29.1	7994	39,9
Portugal	25.4	3152	47,5
Finland	26.4	7097	65,0
Sweden	32.5	9328	60,0
United Kingdom	27.6	7593	53,6
EU-15	28.0	6748	50,8
Iceland	22.3	6999	63,1
Norway	26.3	11755	54,9

Source: Eurostat (2004)

Table A.11: Total expenditure on social protection by type in Europe (% of total expenditure)

	Social benefits			Administration costs			Other expenditure		
	1990	1995	2002	1990	1995	2002	1990	1995	2002
Belgium	95	93	94	3	4	4	2	3	2
Denmark	97	97	97	3	3	3	:	:	:
Germany	96	96	96	4	4	3	0	0	0
Greece	94	96	98	5	4	3	1	0	0
Spain	97	98	98	3	2	2	0	0	0
France	95	95	95	4	4	4	1	1	1
Ireland	96	96	96	4	4	4	0	0	0
Italy	95	95	96	4	3	3	1	2	1
Luxembourg	96	97	98	3	3	2	1	0	0
Netherlands	95	95	94	4	4	5	1	1	2
Austria	97	97	97	2	2	2	1	1	1
Portugal	88	90	90	5	4	4	7	6	6
Finland	96	97	97	4	3	3	0	0	0
Sweden	:	99	96	:	1	4	:	0	0
United Kingdom	95	96	96	5	4	3	0	0	1
EU-15	:	96	96	:	4	3	:	0	1
Iceland	98	98	99	2	2	2	0	0	0
Norway	98	98	98	2	2	2	0	0	:

Source: Eurostat (2004)

Table A.12: Social benefits by function (% of total benefits)

	Sickness and healthcare		Disability		Old age		Survivors		Family and children		Unemploy ment		Housing		Social exclusion	
	1990	2002	1990	2002	1990	2002	1990	2002	1990	2002	1990	2002	1990	2002	1990	2002
Belgium	26,2	22,8	7,4	8,7	30,1	31,7	11,6	9,5	9,2	8,0	13,4	11,6	0,0	0,0	2,1	1,8
Denmark	20,1	20,3	10,0	12,5	36,6	36,6	0,1	0,0	11,9	13,0	15,4	9,0	2,3	2,2	3,6	3,5
Germany	31,8	27,3	6,3	7,4	43,3	39,4	2,5	1,5	7,6	10,3	6,0	8,2	0,6	0,7	2,1	1,7
Greece	24,8	25,5	8,5	5,1	42,5	46,0	9,2	3,3	7,5	6,8	4,1	6,2	2,4	2,3	1,0	2,2
Spain	28,8	29,3	7,7	7,3	38,3	40,8	4,6	2,9	1,7	2,5	18	13,3	0,6	0,8	0,4	0,8
France	29,4	28,1	6,1	5,5	35,9	34,6	6,8	6,4	9,3	8,8	8,3	7,2	2,9	2,9	1,2	1,3
Ireland	33,5	39,9	4,5	4,8	23,3	17,4	6,7	5,1	11,2	15,2	15,8	8,3	3,5	3,0	1,6	2,2
Italy	26,0	25,1	7,7	5,9	48,9	49,5	10,7	10,0	4,9	3,8	1,7	1,7	0,0	0,1	0,0	0,2
Luxembourg	25,2	24,4	12,5	14,0	42,0	25,9	5,6	10,8	10,5	16,3	3,0	3,5	0,2	0,9	1,1	2,2
Netherlands	28,3	29,1	16,5	10,5	32,0	33,4	5,4	5,2	5,6	4,2	8,3	5,0	1,1	1,4	2,8	4,9
Austria	26,0	24,5	7,0	7,3	38,5	39,6	11,6	8,7	10,5	10,2	4,6	5,2	0,5	0,3	1,3	1,3
Portugal	30,6	27,8	16,8	10,3	34,4	33,7	7,5	6,2	7,0	4,3	3,4	3,5	0,0	0,0	0,3	4,2
Finland	28,5	24,1	15,5	13,0	29,6	32,0	4,2	3,8	13,5	11,3	6,1	9,5	0,8	1,1	1,9	2,1
Sweden	:	26,4	:	13,4	:	36,0	:	2,0	:	9,3	:	5,3	:	1,9	:	2,1
United Kingdom	24,4	26,5	9,1	8,9	41,1	41,0	4,1	3,7	9,0	6,5	5,7	3,4	6,0	5,5	0,8	0,9
EU-15	29,1	26,9	7,7	7,7	40,2	39,2	6,3	4,7	7,2	7,7	7,1	6,3	1,1	2,0	1,3	1,5
Iceland	42,9	36,6	8,5	13,4	26,7	27,7	2,9	2,8	14,5	12,7	1,9	2,0	0,0	0,8	2,5	2,5
Norway	29,0	33,4	14,7	17,3	32,7	28,3	1,7	1,4	10,8	12,0	6,9	2,5	0,6	0,6	3,5	2,4
*Israel**	23.2	21.4	9.8	12.9	37.41	34.41	37.41	34.41	23.5	23.7	6.1	7.6	:	:	:	:

**2000 - [1]Old age and survivors are accounted together - Source: Eurostat (2004)*

3. Research and Development:

Table A.13: Research & Development figures. (As a % of GDP)

	Government appropiations 2002	Public Sector R&D 2002	Defence R&D 2002	Growth 95-02 (annual average rate)	Growth 90-02 (annual average rate)
Belgium	0,62	0,45	0,00	2,27	1,48
Denmark	0,67	0,68	0,01	-0,82	-0,71
Germany	0,79	0,79	0,05	-1,85	-1,44
Greece*	0,32	0,33	0,00	1,99	3,82
Spain	0,77	0,36	0,21	6,67	3,16
France	1,02	0,84	0,23	-1,33	-2,37
Ireland	0,30	0,26	0,01	-1,35	0,58
Italy*	0,58	0,51	0,00	-1,00	-2,27
Luxembourg	0,21	0,66	0,01	:	:
Netherlands	0,81	0,70	0,01	0,91	-0,69
Austria	0,67	0,73	0,00	0,00	1,66
Portugal	0,70	0,51	0,01	6,52	5,70
Finland	0,99	0,89	0,02	0,15	1,69
Sweden*	0,76	0,89	0,06	-7,79	-4,22
United Kingdom	0,70	0,53	0,26	-1,53	-1,98
EU-15	0,78	0,65	0,12	-0,71	-1,19
Iceland	:	0,99	0,00	-0,92	4,33
Norway	0,78	0,70	0,05	-0,54	-0,81
United States	0,98	0,71	0,61	0,75	-0,96
Japan*	0,64	0,58	0,04	5,06	3,82
Israel*	0,26	0,26	:	1,98	2,01

**2000 instead of 2002 - Source: Eurostat (2004)*

4. Employment:

Table A.14: Civilian employment in Public Sector, 2003 (thousands in estimated annual average)

	Public admon. and defense, compulsory social security	Education	Health and social work	Other community, social and personal service activities
Belgium	401	343	505	151
Denmark	149	225	484	135
Germany**	2704	1952	3743	1969
Greece	322	284	184	149
Spain	1104	979	986	708
France	2202	1710	2757	993
Ireland	91	118	176	89
Italy	1851	1477	1348	970
Luxembourg	21	12	16	7
Netherlands*	548	514	1146	359
Austria	215	231	325	165
Portugal	333	296	298	156
Finland	116	173	342	126
Sweden	245	482	686	218
United Kingdom	1970	2450	3302	1616
Iceland**	6	12	22	10
Norway	137	190	441	94
European Union-15	12272	11246	16298	7811

**2002, **2001 - Source: OECD LFS (2004)*

Table A.15: Employees in Public Sector, 2003 (thousands in estimated annual average)

	Public admon. and defense, compulsory social security	Education	Health and social work	Other community, social and personal service activities
Belgium	400	340	432	110
Denmark	148	222	466	122
Germany**	2704	1870	3415	1608
Greece	321	261	155	109
Spain	1104	939	927	560
France	2201	1685	2481	847
Ireland	90	113	165	69
Italy	1825	1432	1162	608
Luxembourg	21	12	14	6
Netherlands*	543	495	1081	269
Austria	215	226	298	135
Portugal	330	289	285	116
Finland	116	170	324	99
Sweden	245	477	673	174
United Kingdom	1956	2341	3085	1233
Iceland**	69	11	20	8
Norway	137	188	426	80
European Union-15	12219	10872	14963	6065

**2002, **2001 - Source: OECD LFS (2004)*

Table A.16: Growth in civilian employment, 1995-2003 (annual average growth rate)

	Public admon. and defense, compulsory social security	***Education***	***Health and social work***	***Other community, social and personal service activities***
Belgium	0,51	0,56	3,58	0,68
Denmark	-0,65	2,48	1,40	2,02
Germany	-1,87	0,87	2,51	1,46
Greece	2,13	3,24	1,53	2,12
Spain	3,99	4,23	5,68	5,20
*France**	:	:	:	:
Ireland	3,33	4,03	7,19	2,69
Italy	0,93	-0,10	1,44	2,11
Luxembourg	3,46	3,66	4,80	4,30
Netherlands	0,11	2,32	2,84	3,58
*Austria**	0,34	0,34	0,50	-0,15
Portugal	0,23	-0,97	5,38	-2,04
Finland	-0,32	2,06	2,04	2,93
Sweden	2,19	6,28	-2,10	0,12
United Kingdom	3,03	3,00	2,39	2,04
Iceland	0,00	3,66	0,58	0,00
Norway	1,78	1,78	2,71	1,42
European Union-15	0,69	1,76	2,44	1,94

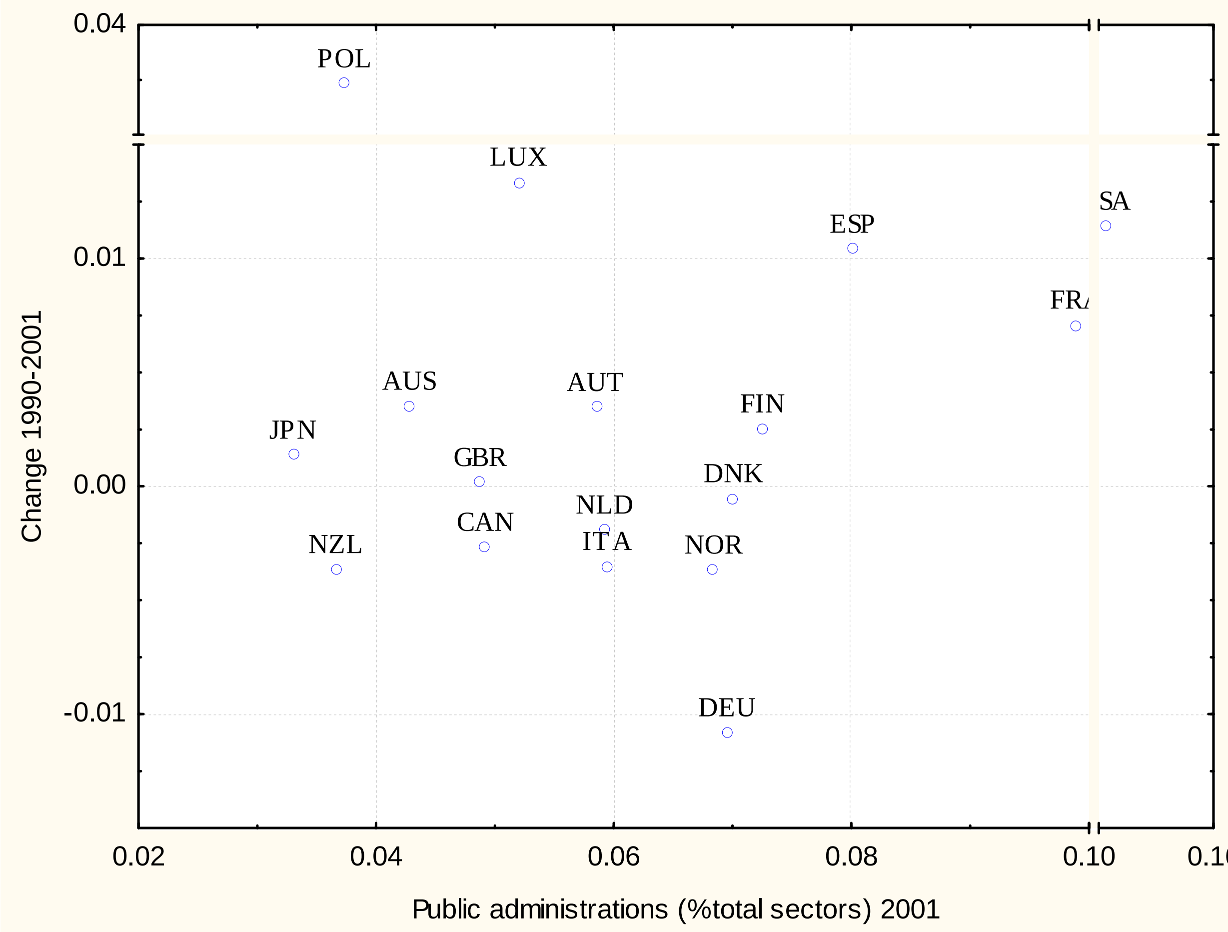
**1995-2001 - Source: OECD (2004)*

Table A.17: Growth in employees, 1995-2003 (annual average growth rate)

	Public admon. and defense, compulsory social security	***Education***	***Health and social work***	***Other community, social and personal service activities***
Belgium	0,54	0,53	3,74	1,58
Denmark	-0,74	2,44	1,43	2,52
Germany	-1,87	0,78	2,59	1,29
Greece	2,14	3,51	1,19	3,31
Spain	4,01	4,25	5,70	6,36
*France**	1,11	0,59	0,99	4,18
Ireland	3,19	3,93	7,14	2,42
Italy	0,83	0,24	1,68	3,11
Luxembourg	3,46	3,66	5,68	5,20
Netherlands	0,19	2,35	3,08	3,58
*Austria**	0,34	0,23	0,59	-0,56
Portugal	0,23	-0,87	5,69	-2,41
Finland	-0,32	1,92	1,75	2,54
Sweden	2,19	6,24	-2,11	-0,21
United Kingdom	3,05	2,98	2,51	1,02
Iceland	35,70	2,54	-0,61	1,68
Norway	1,78	1,64	2,67	2,05
European Union-15	0,68	1,72	2,56	1,90
*Israel**	4.6	-0.1	10.5	-

**1995-2001 - Source: OECD (2004)*

Figure A.1: Share of public administrations (*) in total employment



(*) Including defence and compulsory social security

Figure A.2: Share of health and social work in total employment